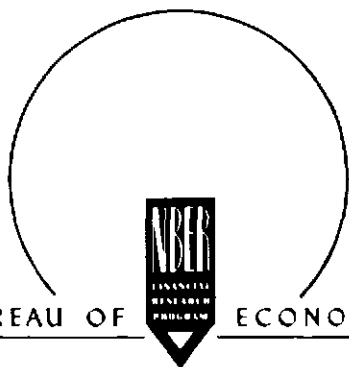

STUDIES IN BUSINESS FINANCING

FINANCING SMALL CORPORATIONS

IN
FIVE MANUFACTURING
INDUSTRIES, 1926-36

by

CHARLES L. MERWIN



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PREFACE

The Studies in Business Financing, of which this monograph is one, is the second major investigation to be initiated under the National Bureau's Financial Research Program, with the support of grants from the Association of Reserve City Bankers and the Rockefeller Foundation. Work on the project began early in 1940, with three major objectives: first, to trace from business accounting records the structural and cyclical changes that have occurred in the financial organization of business enterprise since the turn of the present century; second, to determine, for recent years, the cross-sectional pattern of business credit demands; and third, to describe the adaptations that financing institutions providing short- and medium-term credit have made over the past decade in response to changing demands for their services.

Project research activities have been carried on under two main divisions, one entitled "Changes in Financing American Business Enterprise, 1900-40," concerned primarily with the first objective, and the other, "Contemporary Relations Between Business Enterprise and Financial Institutions," devoted specifically to the second and third objectives. Because of the breadth of the field covered by the two divisions it has proved expedient to prepare a number of complementary technical studies under each, in order to develop and systematize materials in limited areas for later use in more general interpretative studies. While each of these technical studies is of restricted scope, together they build up into a more complete and detailed analysis of changes and adaptations in business financing than would otherwise be possible.

Dr. Merwin's study is one of the technical series under the first division of the project. Others to be published include a volume by Albert R. Koch on the financing of large corporations, 1920-39, and a cross-section study, for 1937, of the financial structure of manufacturing and trade corporations, by Walter A. Chudson. An interpretative analysis of the changes in business financing during the period 1900-40, based on the findings of

these technical studies as well as on other unpublished materials, is in preparation by Sidney S. Alexander.

When work on the Studies in Business Financing was initiated no comprehensive tabulations of corporate financial data covering the entire period of our investigation were available with which to measure changes in the financing practices of business enterprise. Furthermore, existing tabulations were of varying coverage as to time period, industry and size of enterprise represented. The first problem of the project's staff was to test the accounting and statistical consistency of available compilations; the second was to build up supplementary tabulations of corporate financial data from whatever sources that could be drawn upon. A number of public and private agencies cooperated generously in the solution of these problems, particularly the second, and with their assistance several new samples of business financial data were developed from investment manuals, state tax report files, federal corporate income tax returns, the industrial loan files of the Federal Reserve Banks of New York and Philadelphia, Dun and Bradstreet credit reports, bank credit files, and other sources. The complete set of business financial data utilized in this project is to be made available later under the title Data for Studies in Business Finance.

The basic data for the present study were obtained from federal corporate income tax returns. They were originally compiled for the United States Department of Commerce by the Income Tax Study, a Work Projects Administration study sponsored by the United States Treasury Department, for use in the preparation of a report to the Temporary National Economic Committee. The Department of Commerce generously made the tabulations available for our analysis, and in addition, the Income Tax Study prepared special supplementary tables that permitted us to extend the limits of our study. We are greatly indebted to the Department of Commerce, the Income Tax Study, the Work Projects Administration and the United States Treasury Department for their cooperation in making all of these data available for our work. While the period of coverage of the data is confined to 1926-36, the data themselves represent the first comprehensive factual information on the financial operations of small manufacturing corporations for so long a period as a decade, and

therefore constitute a singularly important body of information.

As a source of financial data, income tax returns offer several important advantages. In the first place, they provide both a balance sheet and an income statement for reporting companies. Second, the information contained in such returns is complete enough to permit analysis not only by conventional techniques, such as the ratio method, but also by the more novel method known as the sources and uses of funds analysis, whereby year-to-year changes in different financial statement items may be traced. In the present study we have combined the two types of procedure, and the resultant analysis is far richer in detail and more vividly illustrative of financial processes than an analysis confined to balance sheet relationships alone.

There are, on the other hand, certain limitations to an analysis based upon income tax data. For one thing, since the returns represent the businessman's appraisal of financial conditions, they may or may not accord with realities. Then there are the differences in accounting standards from one company to another; it is known that these standards vary widely, but it is impossible to determine the precise nature of the differences. Beyond this, there are changes in accounting practices of individual enterprises from year to year which influence in indeterminate ways the meaning of accounting categories. Moreover, financial statements obtained from income tax returns are conditioned by regulations and rulings of the Bureau of Internal Revenue, which are subject to modification from time to time. Finally, balance sheet data pertain solely to the end of a calendar or operating year, whereas income statement data pertain to a whole year; many significant variations in financial features occurring during the year, in consequence of seasonal and cyclical forces, are necessarily concealed by such annual data.

Smallness of size of business enterprises is a relative term, and any division between large and small must necessarily be arbitrary. We have taken the asset size of \$250,000 as a dividing line for smallness in manufacturing industry. In the field of distribution a \$250,000 company might be considered medium-size, but the invest-

ment required for entry into the distribution field is considerably smaller than in manufacturing. Most of the companies in the samples covered by this analysis possessed around \$50,000 in total assets.

Besides cooperating in making the basic tabulations for this study available to the National Bureau, the Department of Commerce granted to Dr. Merwin a leave of absence to conduct the study. Dr. Merwin is a member of the staff of the National Income Unit of the Bureau of Foreign and Domestic Commerce, and was originally in charge of planning the tabulations for the report of the Department of Commerce to the Temporary National Economic Committee; these tabulations have now been published in TNEC Monograph 15, Financial Characteristics of American Manufacturing Corporations, of which he is the author.

For general criticism as to method of treatment and many suggestions as to the interpretation of business accounting data, we are indebted to an advisory committee to the National Bureau appointed by the American Institute of Accountants, whose membership included Charles H. Towns, chairman, Charles J.J. Cox and Maurice E. Peloubet. The members of this committee gave generously of their time in reviewing and criticizing the first draft of this study and the present revision has benefited greatly from their help.

RALPH A. YOUNG
Director, Financial Research Program

September 1942

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I am very grateful to Robert R. Nathan and Willard L. Thorp, formerly of the Department of Commerce, for advice and supervision in laying out the basic tabulations; and to the staff of the Income Tax Study, particularly John Benz, Lawrence Brokate, Albert A. Eisenstat, Earl D. Krickbaum and Thomas B. Rhodes, for the cooperative spirit in which they compiled the data.

Professor Simon Kuznets, of the University of Pennsylvania, made helpful suggestions regarding the organization and content of the study. Constructive criticisms of the analysis were made also by Professors J. Parker Bursk, Raymond T. Bye, Oscar S. Nelson and Charles R. Whittlesey, of the University of Pennsylvania. Advice on matters connected with particular aspects of the analysis was given by Solomon Fabricant, of the National Bureau's research staff. My coworkers on the Financial Research Program were unstinting in their cooperation, and discussions with them provided many valuable suggestions; I would mention particularly Carl Kaysen, to whom I am indebted for much of the mathematics of Appendix C.

Elizabeth Todd edited the final draft of the study, and supervised its format and publication; Bettina Sinclair edited the preliminary version. Both editors made many useful suggestions as to organization and content, and the study has benefited greatly from their skilful and enthusiastic work.

CHARLES L. MERWIN

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