# CHEMISTRY OF FOOD COMMODITIES

## A LABORATORY MANUAL

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# PREFACE

Chemistry of Food Commodities is a broad discipline that draws on principles of physical, organic, and biological chemistry. Advances in chemistry of food commodities over the past century have had a dramatic impact on our understanding of all aspects of food science and technology and have played a major role in the improvement of the quality, quantity and availability of the food supply.

This manual is designed for a one-semester laboratory course in Chemistry of Food Commodities. Emphasis is placed on understanding fundamental chemical principles that underline relationships between the composition of foods and functional, nutritional, and organoleptic properties. In addition, many laboratory techniques that are common in basic and applied research are introduced.

Students should have a background in general, organic, and biochemistry as well as a concurrent lecture course in Chemistry of Food Commodities. Each experiment is preceded by an introduction of the principles necessary for understanding and interpreting the data. Students are encouraged to supplement the introductory material by reading selected sections in a comprehensive Chemistry of Food Commodities textbook in addition to the references cited in each of the experiment.

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