

CONTENTS

Preface iii

Contributors vii

1. Wheat 1
Elieser S. Posner
2. Corn: The Major Cereal of the Americas 31
Lawrence A. Johnson
3. Barley 81
Eugene A. Hockett
4. Oats 127
Michael S. McMullen
5. Sorghum 149
Lloyd W. Rooney and Sergio Othón Serna-Saldivar
6. The Millets 177
Cassandra M. McDonough, Lloyd W. Rooney, and Sergio Othón Serna-Saldivar
7. Rice: Production, Processing, and Utilization 203
Navam S. Hettiarachchy, Zhi Yong Ju, Terry Siebenmorgen, and Roy N. Sharp
8. Rye 223
Klaus Lorenz
9. Triticale: Production and Utilization 257
N. L. Darvey, H. Naeem, and J. Perry Gustafson
10. Wild Rice: Processing and Utilization 275
Ervin A. Oelke and James J. Boedicker
11. Oilseeds and Oil-Bearing Materials 297
Edmund W. Lusas
12. Cereal Proteins: Composition of Their Major Fractions and Methods for Identification 363
George Lookhart and Scott Bean

CONTRIBUTORS

Scott Bean Department of Grain Science and Industry, Kansas State University, Manhattan, Kansas

Margaret Ann Bock Family and Consumer Sciences, New Mexico State University, Las Cruces, New Mexico

James J. Boedicker University of Minnesota, Grand Rapids, Minnesota

Okkyung Kim Chung Hard Winter Wheat Quality Laboratory, Grain Marketing and Production Research Center, Agricultural Research Service, U.S. Department of Agriculture, Manhattan, Kansas

N. L. Darvey Plant Breeding Institute, Cobbitty, New South Wales, Australia

Julia L. DesRochers Department of Grain Science and Industry, Kansas State University, Manhattan, Kansas

Ismail Sait Doğan Department of Food Engineering, College of Agriculture, Yuzuncu Yil University, Van, Turkey

Brendan J. Donnelly Department of Grain Science and Industry, Kansas State University, Manhattan, Kansas

Hamed Faridi McCormick & Company, Inc., Hunt Valley, Maryland

Charles S. Gaines Soft Wheat Quality Laboratory, Agricultural Research Service, U.S. Department of Agriculture, Wooster, Ohio

Pierre Gélinas Food Research and Development Centre, Agriculture and Agri-Food Canada, St. Hyacinthe, Quebec, Canada

J. Perry Gustafson Plant Genetics Research Unit, Agricultural Research Service, U.S. Department of Agriculture, and Plant Science Unit, University of Missouri, Columbia, Missouri

Navam S. Hettiarachchy Department of Food Science, University of Arkansas, Fayetteville, Arkansas

Eugene A. Hockett Agricultural Research Service, U.S. Department of Agriculture, and Plant Sciences Department, Montana State University, Bozeman, Montana