

CONTENTS

FOREWORD	vii
ROGANIZATION OF SYMPOSIUM	viii
OPENING PLENARY SESSION	
WELCOME FROM JAPAN SECTION, I.F.T.	3
IUFOST AND THE SYMPOSIUM.	5
OPENING LECTURE: DEVELOPMENT OF INDUSTRIAL MICROBIOLOGY IN JAPAN	7
MICROBIAL ENZYMES AND THEIR APPLICATION TO FOOD PROCESSING	
APPLICATION OF PROTEASES TO FOOD PROCESSING.	13
APPLICATION OF TRAMETES SANQUINEA ENZYME TO THE FOOD PROCESSING.	17
ENZYMATIC PROTEIN HYDROLYSIS AND PLASTEIN SYNTHESIS: THEIR APPLICATION TO PRODUCING ACCEPTABLE PLOTEINACEOUS FOOD MATERIALS.	19
IMPROVEMENT OF SOYBEAN PRODUCTS BY MICROBIAL MEANS.	41
APPLICATION OF HEMICELLULASE, NARINGINASE AND HESPERIDINASE.	53
CLARIFICATION OF FRUIT JUICE BY PECTIN TRANS-ELIMINASE.	63
THE USE OF IMMOBILISED ENZYMES IN THE FOOD INDUSTRY.	65
CONTINUOUS OPTICAL RESOLUTION OF ACETYL-DL-AMINO ACIDS BY IMMOBILIZED AMINOACYLASES.	75
FUNDAMENTAL ASPECTS OF THE USES OF STARCH DEGRADING ENZYMES.	87
A NEW AMYLASE WHICH PRODUCES SPECIFICALLY MALTOHEXAOSE FROM AMYLOSE.	95
MUCOR RENNIN.	99
APPLICATION OF PECTOLYTIC ENZYMES.	113

TRADITIONAL FOODS

SHOYU.	117
MISO.	127
MICROBIALLY PRODUCED FOODS IN THE TROPICS.	113
KIMCHI.	141

CONTENTS

THE PROGRESS OF PRODUCTION METHODS OF JAPANESE SAKE.	145
THE ROLE OF INORGANIC MATTERS IN SAKE MAKING.	151
APPLICATION AND ELIMINATION OF MICRO-ORGANISMS IN WINE-MAKING.	153
VIEW OF THE GRAPE GROWING AND WINE INDUSTRY OF JAPAN.	159
RECENT PROGRESS IN STUDIES ON BITTER FLAVOR OF BEER.	161
BACTERIOLOGY OF FERMENTED MILK WITH SPECIAL REFERENCE TO THE IMPLANTATION OF LACTOBACILLI IN THE INTESTINE.	169
CHARACTERISTIC FEATURES OF BEVERAGE CONTAINING LIVE LACTOBACILLI.	181
OCCURRENCE AND ROLE OF MICROORGANISMS IN CHEESE.	191

MODERN MICROBIAL FOODS

ENGINEERING DEVELOPMENTS IN THE PRODUCTION OF SINGLE-CELL PROTEIN.	201
FUNGI AS PROTEIN FOR FOOD USE.	221
RECENT ASPECTS ON MICROBIAL FAT PRODUCTION.	225
MYCELIUM OF EDIBLE MUSHROOM GROWN ON NONCARBOHYDRATE ORGANIC SUBSTANCES, ESPECIALLY ON ETHANOL, AS PROTEIN FOR FOOD USE.	227
PRODUCTION OF AMINO ACIDS BY FERMENTATION.	229
PRODUCTION OF NUCLEOTIDES BY MICROORGANISMS.	235

SPECIAL LECTURES

NEW DEVELOPMENT IN FOODSTUFFS MANUFACTURE RELATED TO MICROBIAL PROCESSING OF HYDROCARBONS AND PETROCHEMICALS.	245
SAFETY EVALUATION OF SINGLE CELL PROTEIN FOR HUMAN FOOD USE.	249
REGULATORY PROBLEMS AND PROCEDURES IN THE CLEARANCE OF UNCONVENTIONAL PROTEIN FOODS.	259
OPEN DISCUSSION	267

CLOSING

SYMPOSIUM SUMMARY: THE CONVERSION AND MANUFACTURE OF FOODSTUFFS. CLOSING LECTURES;	279
FOODS IN THE 21ST CENTURY; A SURVEY ON FUTURE FOOD PROBLEMS.	283
LIST OF FOREIGN PARTICIPANTS	289
LIST OF JAPANESE PARTICIPANTS	290
LIST OF COMMITTEE MEMBERS	296