

**TRADITIONAL FOODS, FERMENTED FOODS  
AND ALCOHOLIC BEVERAGES OF NORTH  
BENGAL**



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**Kripa Drishti Publications, Pune.**

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**and**

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## **PREFACE**

Food is any edible substance consumed to provide nutritional support to living organisms. Food is usually of plant, animal in origin, and contains essential nutrients, such as carbohydrates, fats, proteins, vitamins, or minerals. Food fermentation is one of the unique technique to preserve the raw materials harvested by the farmers in large scale. The process fermentation specially convert the starch and other polysaccharides in to monosaccharaides and finally the monosaccharaides are converted in to organic acids, ethanol and important components which can be utilised further as foods, medicines. The organic acids, ethanol and other antimicrobial compounds which is synthesised by microbes during fermentation are playing important role in food preservation and hence, increasing the shelf-life of the foods and alcoholic beverages produced at household level. Our grandparents are real biotechnologists, unknowingly they were preserving the foods by natural fermentation at their home. The best examples are Dahi and other fermented foods which is prepared and consumed by ancient time, the best example of starter culture and biotechnology. Food microbiology is the study of the microorganisms that inhabit, create, or contaminate food, including the study of microorganisms causing food spoilage; bacteria, however, such as probiotics, are becoming increasingly important in food science. In addition, microorganisms are essential for the production of foods such as cheese, yogurt, bread, beer, wine and other fermented foods. Yeast, especially *Saccharomyces cerevisiae*, is used to leaven bread, brew beer and make wine, alcoholic beverages. Certain bacteria, including lactic acid bacteria, are used to make yogurt, cheese, hot sauce, pickles, and fermented sausages. In this book we have documented all the information regarding traditional method of Fermented food and alcoholic beverages preparation, consumption, sales, ethnic significance, socio-economic values. We have documented how these fermented foods and alcoholic beverages are related with the livelihood of the ethnic tribes

of the entire region of North Bengal. Due to the indigenous knowledge of ethnic tribes and the new methods introduced by the immigrants arriving from other states of India, a wide variety of fermented foods are produced in North Bengal. In this book, we have collected information about the traditional method of production of dairy, meat, fish, vegetables, cereals based fermented foods. Special focus has been given to documentation of fermented naturally alcoholic beverages and dairy products and fermented vegetables knowledge on preparation of various fermented food products is covered in the book. Food fermentation is one of the oldest traditional technologies for production of edible products in the development of human civilization. Fermented foods are defined as food products prepared by the people using their indigenous knowledge of food fermentation from locally available raw materials of plant or animal source either naturally or by adding starter culture(s) containing functional microorganisms which modify the substrates biochemically and organoleptically into edible products that are socially and culturally acceptable to the consumers. Fermented beverages and alcoholic drinks are socially and culturally acceptable products for consumption, drinking, entertainment, customary practices and religious purposes. Drinking of alcoholic beverages and distilled alcohol are widespread interest enhancing the pleasure of eating and have nutritional significance. Natural fermentation precedes human history. Since ancient times, humans have exploited the fermentation process for the production of fermented foods. Fermentation in food processing is the process of converting carbohydrates to alcohol or organic acids using microorganism's yeasts or bacteria under anaerobic conditions. The term fermentation sometimes refers specifically to the chemical conversion of sugars into ethanol, producing alcoholic drinks such as wine, beer, and cider. This book consists of six chapters covering the Chapter-1 Fermented Foods: An Overview, Chapter-2 Ethnic Fermented Foods And Alcoholic Beverages of Uttar-Dinajpur District of North-Bengal, Chapter-3 Traditional Fermented Foods and Alcoholic Beverages of Siliguri Sub-Division

of North Bengal, Chapter-4 Fermented Foods of and Alcoholic Beverages of Darjeeling, Kurseong, Kalingpong, Mirik Hills, Chapter-5 Fermented Foods and Alcoholic Beverages of Alipurduar and Cooch-behar District of North-Bengal and Chapter-6 Traditional Fermented Foods and Alcoholic Beverages of Jalpaiguri District of North-Bengal. This book will create first line database of various fermented foods and alcoholic beverages of North Bengal region based on cereals, pulses, vegetables, fruits, dairy, grains and meat products. This book will be highly beneficial for undergraduate and postgraduate students of Food Microbiology, Food Technology, Food Biotechnology and Food Science disciplines.

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In this book we have tried to give complete and latest information on various aspects of traditional food, its ethnicity, socioeconomic background, livelihood management of rural ethnic communities in North Bengal that include Darjeeling, Jalpaiguri, Alipurduar, Cooch Behar, Uttar Dinajpur, Malda and Dakhsin Dinajpur and Siliguri. This book specifically is meant for undergraduate, postgraduate and researchers of allied fields belonging to Botany, Ethno-botany, Microbiology, Food Technology and Food Biotechnology.

I am very much grateful to Kripa Drishti Publication (KDP) for publishing this book in their reputed publication house. Last but not the least we would like to acknowledge the rural villagers of all districts of North-Bengal regions who have given their valuable time and information regarding the traditional method of food fermentation, its mode of consumption, ethnic significance, and livelihood for their sustainability.

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