

The study of molecular biology has widespread applications covering genetic research, drug delivery systems, stem cell therapy and cancer treatment. The functioning of biological systems is based on the flow of genetic information from the nucleotides of the DNA to the RNA leading to the production of various cellular proteins. Thus, control is exercised only by modifying the various stages of protein synthesis. Hence, the ideal approach to the study of the subject is in understanding the genetic processes that are reflected as changes in protein reactions.

This book is a comprehensive overview of the subject and is written in a clear and simple language. It also incorporates several student-friendly features. There are numerous illustrations and tables that will enable readers to grasp the concepts easily. Each chapter begins with Learning Objectives and includes Key Points and Self-assessment Questions. The Further Reading section guides the students towards advanced discussion of the topics. It is hoped that the book will be a valuable textbook to students of biotechnology, genetics and other courses which have molecular biology as a component.

Dr Channarayappa has PhD degrees from the University of Agricultural Sciences, Bengaluru and the West Virginia University, USA. He worked as a Postdoctoral Fellow and Postdoctoral Research Associate at the University of Texas, MD Anderson Cancer Centre, Houston, USA. He has been teaching under graduate and postgraduate courses in molecular biology and biotechnology for the past 25 years. His main areas of interest are genetics, plant breeding and cancer biology. He is the author of *Cell Biology* and *Molecular Biotechnology*, also published by Universities Press.

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