— Solution recipes

— Suppliers.

This book would be useful for people working in the fields of biochemistry, molecular biology, biophysics, and for advanced students.

PII: S0960-0760(98)00018-1

Cell and Molecular Biology. D. Rickwood and D. Patel. Essential Data Series, edited by D. Rickwood and B. D. Hames. Published 1995 by John Wiley & Sons, Chichester, UK. 224 pages. ISBN: 0-471-95568-XPrice at Jan. 1995: £14.99.

This volume is an invaluable compendium of essential information required by all cell and molecular biologists. As well as providing a wide range of core information needed by all researchers in the biomolecular sciences, it brings together additional selected information of importance from the areas of biochemistry, cell biology, genetics and molecular biology.

The book is divided in to the following sections:

— Buffers end solutions

— Properties of small molecules

— Properties of macromolecules

— Cells and subcellular fractions

— Fractionation and analytical methods

— Numerical data

— Safety

and includes a list of manufacturers and suppliers.

PII: S0960-0760(96)00244-0

Nucleic Acid Hybridization. P. M. Gilmartin. Essential Data Series, edited by D. Rickwood and B. D. Hames. Published 1996 by John Wiley & Sons, Chichester, UK. 135 pages. ISBN: 0-471-95084-XPrice at Jan. 1995: £12.99.

This book provides essential information on nucleic acid hybridization, which is central to a range of important techniques in widespread use in molecular biology, but which requires careful optimization in order to generate reliable experimental data. It includes invaluable guidance and key data on, for example, labeling probes, blotting procedures, hybridization conditions and detection system.

The following main topics are covered:

— Equipment, reagents and chemicals

— Electrophoresis of nucleic acids for hybridization analysis

— Transfer of nucleic acids to hybridization membranes

— Preparation of hybridization probes

— Hybridization of immobilized nucleic acid

— Nucleic acid hybridization in solution

and includes a list of manufacturers and suppliers.

PII: S0960-0760(96)00245-2

Transcription Factors. J. Locker. Essential Data Series, edited by D. Rickwood and B. D. Hames. Published 1996 by John Wiley & Sons, Chichester, UK. 150 pages. ISBN: 0-471-95339-3. Price at April 1996: £12.99.

This volume is unique in providing, for the first time, a detailed compendium of information on RNA polymerases I, II and III, and their associated transcription factors, including DNA binding domains. The data are fully up-to-date and have been compiled by exhaustive searches of the primary literature and relevant databases. The book will be invaluable for all molecular biologists involved in studying gene regulation.

There are four main sections as follows:

— RNA polymerase II and associated factors

— RNA polymerase II transcription controls of animals: DNA binding sites and transcription factors

— Eukaryotic RNA polymerase I and III transcription factors

— Transcription factor families and DNA-binding domains

as well as an appendix of DNA and amino acid codes.

PII: S0960-0760(96)00246-4

Signal Transduction. Modular Texts in Molecular and Cell Biology–Vol. 1. Carl-Henrick Heldin, Mary Purton. Published 1996 by Chapman & Hall, London, U.K. 365 pages. ISBN: 0-412-70810-8£24.99.

Research on the molecular mechanisms of signal transduction has been very intense during recent years and this book aims to provide an up-to-date summary of the vast amount of information now available on this subject. Several types of receptors described have a common feature in that their activation leads to an increased phosphorylation of cytoplasmic proteins on tyrosine residues. This kinase activity can either reside in the receptor or in an associated protein. Receptors for members of the TGF-β superfamily also signal via stimulation of protein phosphorylation, but in this case with specificity for serine or theonine residues. Written for an audience with a basic understanding of molecular and cell biology, this volume provides an invaluable overview of a rapidly developing field, emphasizing common themes and structures with extensive cross-references.

Part One: 'Cell Surface Receptors' covers the structural and functional properties of the major classes of cell surface receptors in 8 chapters as follows:

— Signaling through receptor tyrosine kineses

— Signal transduction through class I cytokine receptors