
Preface

Why Quantitate Gene Expression?

The central dogma of molecular biology is the concept of the transcription of messenger RNA from a DNA template and translation of that RNA into protein. Since the transcription of RNA is a key regulatory point that may eventually signal many other cascades of events, the study of RNA levels in a cell or organ can help the understanding of a wide variety of biological systems.

It is assumed that readers of *Gene Expression Profiling: Methods and Protocols* have an appreciation for this fact, so that the present volume focuses on the practical and technical considerations that guide the choice of methodology in this area. Thoroughly thinking through the specific scientific questions at hand will enable the choice of the best technology for that application and examples of which technologies fit which applications best will be discussed.

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