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                        IntervalsDr -- Chapter 2: Conventional Microscopic and Serological
                        Techniques for Human Body Fluid Detection -- Chapter 3: DNA
                        methylation approaches of human body fluid detection -- Chapter 4:
                        Detection of Forensically relevant body fluids using mRNA markers
                        Section II: Estimation of PMI -- Chapter 5: Overview of conventional
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                        Chapter 8: Estimation of the time since death through metabolomic
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by new generation sequencing in the study of sudden cardiac death within the forensic context Section IV: Individualization and Investigative Leads -- Chapter 14:Achieving Individualization using STR markers -- Chapter 15:Use of bi-allelic markers for individualization from forensic biological samples -- Chapter 16: Applications of haplodiploid markers in Forensic Genetics -- Chapter 17:Lineage markers and their applications in Forensic DNA analysis -- Chapter 18:The Y-chromosome in forensic casework -- Chapter 19: Mapping the Post-Crania for Optimal Y-DNA and Stable Isotope Sampling -- Chapter 20:Achieving Individualization using STR markers -- Chapter 21: Use of mtDNA sequencing technique in Forensic DNA analysis -- Chapter 22:X-STR markers and its application in Forensic DNA analysis -- Chapter 23:Application of Next Generation Sequencing (NGS) technology for individualization in forensic context Section V: Wildlife Forensics -- Chapter 24:DNA barcoading and its application in identification of plant species -- Chapter 25: Analysis of counterfeit wood products and DNA typing in forensic botany -- Chapter 26:Elucidating Genetic Signatures: DNA barcoding and Genetic profiling of Endangered forest Species of Western Ghats.

| Sommario/riassunto | The book explores the interdisciplinary field that merges biochemistry, cell biology, molecular biology, and genetics to unravel the mysteries of biological evidence in forensic investigations. Delving into the core of this dynamic discipline, the book unveils how forensic biological scientists leverage a diverse range of techniques to address complex questions posed by investigative agencies. The book meticulously covers different facets of forensic biology, from uncovering the origins of crucial body fluids to predicting the post-mortem time interval, while deciphering the cause and manner of death to individualizing biological samples. This book consolidates the latest breakthroughs in forensic biology and genetics, embracing both human and non-human DNA analyses, helpful for the forensic biological scientists. Chapters are written by researchers and practitioners from around the world. This book serves as an indispensable resource for investigating officers, forensic scientists, medical practitioners, researchers, and students. |