

## **Genetics Summer Internships**

Join Genetics summer internships to explore the science of genes, heredity, and variation in living organisms, focusing on molecular genetics, population genetics, gene regulation, and the latest research in genomics and biotechnology.

## Focussed Areas under Genetics Summer Internship

- 1. Molecular genetics and gene regulation
- 2. Population genetics and evolutionary biology
- 3. Genetic mapping and linkage analysis
- 4. Gene editing technologies (CRISPR, TALENs)
- 5. Genetic disorders and gene therapy
- 6. Epigenetics and gene expression regulation
- 7. Genetic variation and polymorphisms
- 8. Genomic sequencing and data analysis
- 9. Plant and animal breeding genetics
- 10. Functional genomics and gene function studies
- 11. Genetic engineering and transgenic organisms
- 12. Gene-environment interactions in genetic expression
- 13. Genetics of cancer and other diseases
- 14. Gene regulatory networks and systems genetics
- 15. Genetic diversity in populations and conservation genetics
- 16. Genetic biomarkers for disease prediction
- 17. Pharmacogenetics and personalized medicine
- 18. Gene cloning and recombinant DNA technology
- 19. Gene silencing technologies (RNAi, siRNA)
- 20. Genetics in agriculture and food security

## Protocols Covered across various focussed areas under Genetics Summer Internship

- 1. CRISPR-Cas9 gene editing protocols
- 2. Genetic mapping and linkage analysis methods
- 3. PCR and genotyping techniques for genetic variation
- 4. Epigenetic profiling methods in gene regulation studies
- 5. Genome sequencing and annotation techniques
- 6. Gene expression analysis using RNA sequencing
- 7. Gene cloning protocols for genetic engineering

- 8. RNA interference and gene silencing protocols
- 9. Gene therapy experimental designs
- 10. Genetic diversity assessment methods in population genetics

**Duration: 5, 10, 15, 20, and 30 Days** 

Note: Please cross confirm whether internship slots for this field are available before joining.

Click Here for Genetics Summer Internship Fees

Application Process and Other info