Nur Shahir, PhD

Contact

600 MLK Blvd
Apt 520
Chapel Hill, NC 27514

Mobile no:
+1 4437454467

Email:
nmshahir@gmail.com

Education

PhD in Curriculum for Bioinformatics and Computational Biology
2020, University of North Carolina at Chapel Hill
Advisor(s): Terrence S. Furey PhD and Shehzad Z. Sheikh MD, PhD

MS in Statistics
2013, University of Maryland, Baltimore County
Advisor: DoHwan Park

SB in Mathematics
2010, Massachusetts Institute of Technology

Programming Languages

R
Python, bash, MySQL,SAS, JAVA, QIIME2
HTML5
LaTeX

Certificates

Graduate certificate in Translational Medicine from the University of North Carolina at Chapel Hill.

Experience

2015-2020 **University of North Carolina at Chapel Hill** Chapel Hill, NC
Graduate Research Assistant

- Performed exploratory analysis and association studies of the mucosa-adherent microbial populations of the human colon and terminal ileum in Inflammatory Bowel Disease (IBD) and surgical controls.
- Performed predictive functional analyses on 16S rRNA sequencing data
- Developed bioinformatic workflow for microbiome analysis for use on high performance computing clusters
- Presented research at local and national conferences

2015 **University of North Carolina at Chapel Hill** Chapel Hill, NC
Teaching Assistant: Statistical Modeling

- Served as a guest lecturer for the class
- Collaborated on curriculum development.
- Held regular office hours and met with students upon request.
- Graded all written work.

2015 **University of North Carolina at Chapel Hill** Chapel Hill, NC
Coding Instructor: R

- Collaborated on curriculum and pre-test development.
- Lead small group lectures on topics and concepts in R.
- Served as a guest lecturer for main lecture portion of class.

2014 **University of North Carolina at Chapel Hill** Chapel Hill, NC
Graduate Research Assistant (Rotations)
Research areas:

- Development of an informatics approach for the analysis of human exome sequencing data to augment newborn screening
- Computational indentification of RNA splice junctions in SERPINA1, a serine protease inhibitor.

2012 **Genetics and Molecular Biology Branch, NHGRI** Bethesda, MD
Summer Fellow Mentors: Dr. Julie Segre, Dr. Sean Conlan

- Piloted a study on the viral diversity of the human skin through the use of metagenomic datasets acquired from the human microbiome project.
- Assisted with fungal speciation of Malassezia species through bioinformatic tools
- Applied various bioinformatic tools including: Clustal, BioPython, BioPerl, and Bowtie
- Extracted full viral genomes from metagenomic datasets

2009 **Medical Genetics Branch, NHGRI** Bethesda, MD
Summer Fellow Mentors: Dr. Ellen Sidransky, Dr. Nahid Tayebi

- Worked on defining the association between glucocerebrosidase mutations and Parkinsons disease.
- Learned and applied biological methods: including sequencing, PCR, westerns, RNA and protein extractions.
- Performed statistical analysis on gene expression data via Excel
- Trained incoming fellows in lab protocols
- Presented research at NHGRI and NIH poster sessions