

## Open PhD positions to be filled up soon

**ZGLab** at Bose Institute, Kolkata is seeking highly motivated doctoral research fellow(s) who is interested to work in interdisciplinary projects which will involve multi-omic data analysis, development of machine learning based tools and other high throughput data analysis. The project is as follows:

Neurodegeneration is the destruction of axons which can occur as an effect of sudden Traumatic Brain Injury (TBI) or can occur gradually as is observed in the case of neurodegenerative conditions like Alzheimer's disease(AD).

Long noncoding RNAs (lncRNAs) are a group of novel noncoding RNAs which has a profound role in neuronal development and disorders. In the 1<sup>st</sup> phase of this work we shall study the progression of gradual and sudden neurodegeneration as observed in AD and TBI respectively. Further, we would explore the role of ncRNAs specially lncRNAs in such disease progression.

Various studies have reported that neurodegenerative diseases and cancer have an inverse correlation of prevalence. The former is a progressive disease while the latter is uncontrolled cell proliferation. In the 2<sup>nd</sup> phase of this work, we shall explore such interesting shared genetic component between neurodegeneration and cancer.

We shall at first integrate data science and machine learning approach to solve the problem. Significant findings will be further strengthened using wet bench techniques.

Essential Qualification:

(a) Master Degree in any stream of Biological Sciences preferably in Bioinformatics.

(b) Candidates should have an award of a valid JRF (CSIR-UGC JRF/ DBT-JRF/ ICMR-JRF/ DBT-BINC or equivalent). Candidates, who are in the final year of their Master's degree and are in possession of an award of a JRF, if selected, will have to submit their final degree certificate at the time of joining.

Or,

(a) M.Sc./M.Tech in Computer Science

(b) Candidates should have an award of a valid JRF (CSIR-UGC JRF/ DBT-JRF/ ICMR-JRF/ DBT-BINC or equivalent). Candidates, who are in the final year of their Master's degree and are in possession of an award of a JRF, if selected, will have to submit their final degree certificate at the time of joining.

Apart from these, the candidates must have **sincere interest** to work in an interdisciplinary environment.

The position(s) will be filled up in the coming round of interview to be held in February 2024 tentatively. Interested candidates must contact Dr. Zhumur Ghosh at [ghosh.jhumur@gmail.com](mailto:ghosh.jhumur@gmail.com) with their detailed CV better within January 2024.