

## **Garuda Platform and Its Applications in Biomedical Research**

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With the ever-increasing diversity of omics-scale experimental data, a key challenge is the ability to discover the right tools for a specific analysis and navigate through their specific formats. Garuda is an open, community-driven, platform that provides a framework to discover, connect & navigate through different applications in bio-medical research. We provide an overview of the Garuda platform, the community Garuda Alliance and a brief demonstration of the platform in action together with its various components. Further, we focus on case studies of the application of Garuda platform in different domains, from analysis of transcriptomics data, pathway and network biology driven analysis and outline current use cases in these scenarios. Further, we provide scenarios of application of Garuda platform in drug discovery, translational research as well as analysis of clinical data. We summarize with a vision on applications of Garuda across the different stages of research and analytics in biomedicine and the role of Garuda as an integration platform to connect, discover and navigate the complexity of biomedical data.