Message from the Guest Editors

Dear Colleagues,

Bacteria develop metal resistance in a variety of environments, both natural and anthropogenic. Metal resistant bacteria are routinely isolated from natural metal ion rich environments as well as metal polluted sites from mining/refining/manufacturing operations. Additionally, we now recognize an increased metal load from our dense city populations leading to high metal accumulation in water treatment plants. Further there is now an increased use of metal-based antimicrobials to help with solutions to the antimicrobial resistance era threats. All these metal load situations lead to bacteria evolving metal resistance. Metal ion resistance may be through specific gene(s) or operon(s) evolved for resistance towards a specific metal. Or the resistance may be due to a combination of genes expressed uniquely that leads to a physiology of either specific or multimetal resistance. Finally, evolving metal resistance may also lead to develop antibiotic resistance.

We kindly invite researchers working on any of these areas to submit their original research or review articles to this Special Issue.