

INFUSE 2025: International Conference on Frontiers of Unified Science and Exploration



Contribution ID: 8

Type: Poster

Assessment of Salutary properties of Schiff Base derived from Alloxan synthesised through Green Technology

ABSTRACT

The formation of complexes involves the binding of an intriguing class of ions or molecules called ligands to a central metal ion. The facility of ligands to behave as “Lewis Bases” or donate a single pair of electrons has revolutionized the pharmaceutical industry. This broad family of chemicals is created when a primary amine and an aldehyde or ketone condense under specific circumstances. Among other things, the ligands antiviral, antibacterial, anti-inflammatory, antiproliferative, antifungal, anticancer, and antioxidant properties make them effective. The antibacterial qualities of Schiff bases in vitro encourage researchers to develop new anti-biofoulants. A yield ranging from good to high is achieved using the moderate conditions used for ligand synthesis. Ligand-based redox reactions provide new principles for catalytic drug creation. The creation of new materials with a range of applications is made possible by organometallic complexes. The electrical shifts between ligand and metal complexes provide the framework for drug synthesis that is used in many different sectors. The synthesized ligand characterized using UV, IR, NMR and screened for their antibacterial activities and docking studies.

Key Words: Alloxan Semicarbazone , UV, IR, NMR, Antibacterial, Docking.

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Track Classification: Chemical Sciences