SYNTHESIS OF FLUORINATED THIAZOLES AS ANTICANER AGENTS

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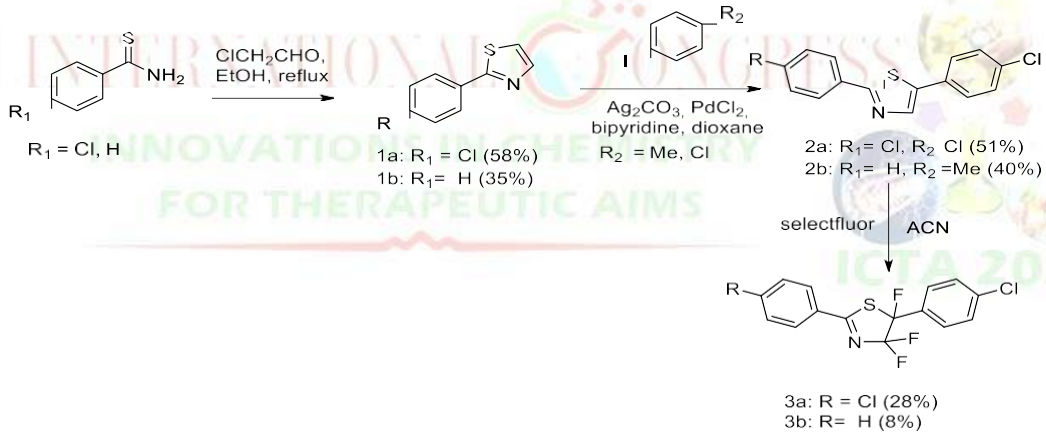
Code CCO20

Communications Orales

Introduction & Objectives:

The synthesis of heterocyclic rings has been a fascinating field in therapeutic science. Various heterocyclic compounds containing nitrogen and sulfur have flexible frameworks for drugs development and design. [1]
Fluorine-containing heterocycles continue to receive considerable attention due to their unique properties. In medicinal chemistry, the incorporation of fluorine in small molecules imparts a significant enhancement their biological activities compared to non-fluorinated molecules.[2]

Methodology (Material and methods):



Results and Discussion:

Thiazoles **1a,b** are prepared by condensation of thioamides with chloroacetaldehyde. The synthesis of diarylthiazoles **2a,b** prepared by using palladium catalysis according to the protocol described by the method of *Tani et al*[3]. The products **2a,b** are treated with select fluorto give the products **3a, b.**

Conclusion:

two cytotoxic agents, fluorizoline analogues have been prepared, these analogues of fluorizoline can be used as chemical tools to explore PHB signaling in cancers and other diseases.

Keywords: Fluorine, Cancer, Synthesis, Thiazole, Fluorizoline.

References

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