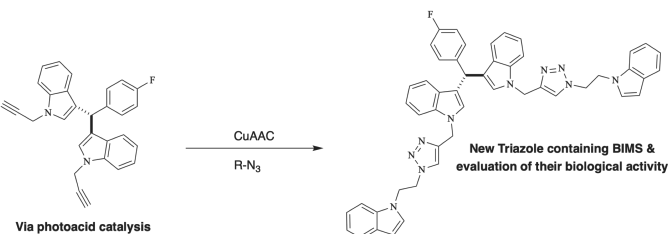


Jason Saway, Ali Akram, and Joseph Badillo.

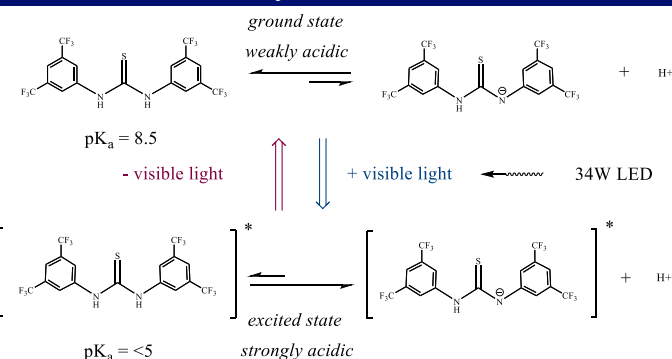
Department of Biochemistry & Chemistry, Seton Hall University, South Orange, NJ 07079

Abstract

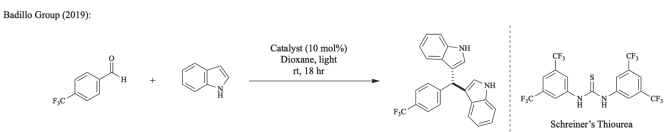
Triarylmethane compounds derived from various aldehydes and indoles have been studied for their potential to treat a variety of cancers. Some of the compounds studied have exhibited selectively for cancer cells vs. normal ones. Recently, our laboratory developed a photoacid catalyzed strategy for the synthesis of triarylmethanes and 3,3'-diaryloxindoles. A variety of triazole containing triarylmethanes and 3,3'-diaryloxindoles using coppercatalyzed azide-alkyne cycloaddition (CuAAC) chemistry were synthesized and optimized in order to evaluate their anti-cancer properties. These triazole modified compounds have the potential for divergent selectivity relative to their parent compounds, due to their unique structure. Preliminary biological studies in collaboration with the Gantar Lab in the Department of Biology for these triazole-containing is shown.



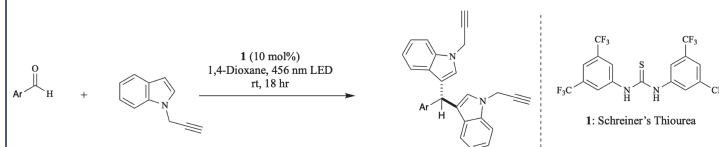
Increased Acidity of Schreiner's Thiourea



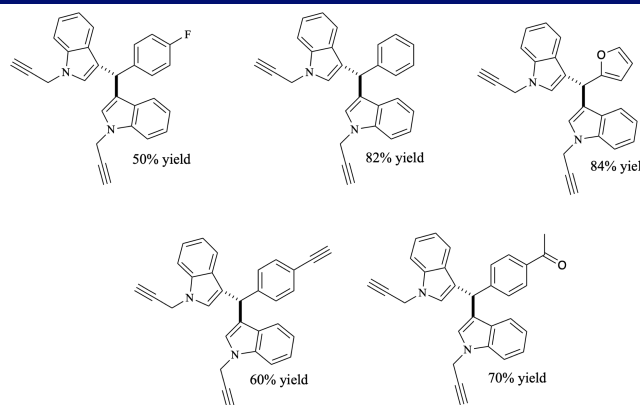
Previous Works



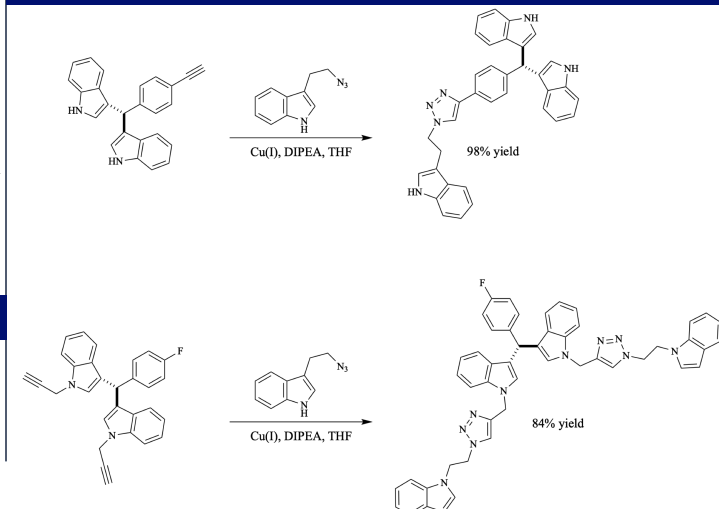
Synthesis of Intermediates



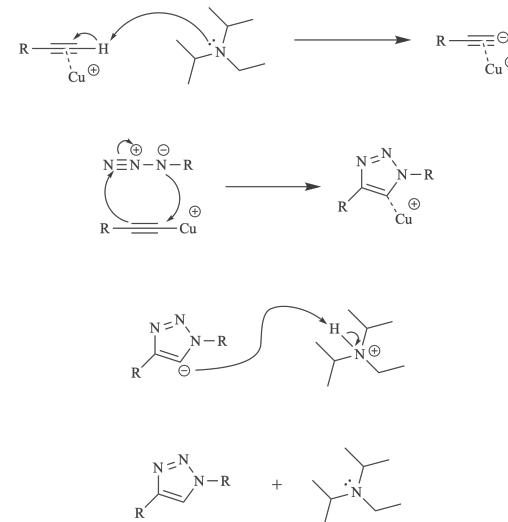
Intermediates



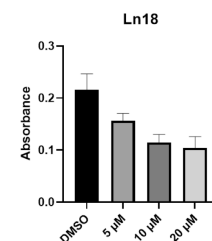
Synthesis of Bis(indolyl)methanes and di(indolyl)oxindoles



Mechanism of Copper-catalyzed Azide-Alkyne Cycloaddition



Biological Activity



Acknowledgements

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