Microwave irradiation: An asset in synthetic chemistry

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**Abstract:** Synthesis has always been at the forefront of research and in the development of materials and compounds. A search for a novel molecule leads to the exploitation of several raw materials and techniques so as to provide a sustainable and efficient strategy for the synthesis. An ideal synthetic process must be short, clean, and high yielding. A rising concern for the environment requires the strategy to follow the Green Chemistry principles. Overcoming all these challenges, microwave-assisted synthesis has risen to the heights where it is crowned as a better synthetic method than a conventional synthetic methodology. Here, we have presented a brief overview of how this technique has affected various synthetic methodologies.

*Keywords: Microwave irradiation; Synthesis; Nanoparticles, Polymers; Metal-complex*

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