

Comprehensive Review on Herbal Drugs as Novel Drug Delivery Systems

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Abstract: *Traditional medicine has always used herbal medicines since they contain a multitude of bioactive phytoconstituents with proven therapeutic benefits. The lack of specific activity, low bioavailability, low water-solubility, and chemical instability have complicated the introduction of them into modern pharmacotherapy. Several innovative drug delivery systems, such as nanoparticle, liposomes, phytosomes, niosomes, nanoemulsions, etc., have turned out to be coach potatoes in destroying these limitations. These delivery methods enhance stability, bioavailability and localization of herbal drugs besides reducing toxicity and enhancing compliance among patients. The review provides a detailed analysis of various herbal NDDS formula, commercial products, current challenges and even future trends.*

Keywords: Herbal medicine, Novel Drug Delivery Systems (NDDS), Phytosomes, Liposomes, Nanoparticles, Niosomes, Bioavailability, Targeted delivery, Phytoconstituents, Green nanotechnology, Cosmeceuticals, Standardization, Personalized medicine

