

Peptide containing nanostructural polymeric drug carrier systems for targeted delivery

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Synthesis/method/protocol: Using novel encapsulation strategies we have developed and evaluated nanoparticles (NPs), employing biodegradable polymers with enhanced colloidal stability and surface biocompatibility. Cellular uptake, selectivity and biodistribution were studied.

Our scientific goal: to enhance cellular uptake and bioavailability using surface decorated NPs with improved host cell targeting ability.

Result: To provide the proof of principle, internalisation profile of the NPs was evaluated and their in vitro and in vivo activity were determined. We have defined optimised NPs with controlled release and site-specific delivery.

