

Drug delivery and targeting in Traditional Iranian Pharmacy

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Background and Aims: Many of the pharmacological properties of conventional drugs can be improved through the use of drug delivery systems (DDS). The purpose of the present study is to review the considerations about drug delivery and targeting addressed in Traditional Iranian Pharmacy.

Methods: There are valuable and scientific Traditional Iranian Pharmacy-related documents e.g. Exir-e Aazam and Kholasat-ol hekma discussing about dosage forms, nature and potency of drugs, methods of enhancing the effects of drugs and optimization of drug delivery to sites of action and improving the pharmacological and therapeutical properties of drugs administered. So, in this study a list of natural drugs with ability of drug delivery was prepared.

Results: Drug delivery, although dependent on the site of effect, is often controlled by many types of barriers. To overcome drug delivery pitfalls, we found in Traditional Iranian Pharmacy literature many of natural drugs play a role in drug delivery to liver, heart, brain, stomach, kidney, bladder, spleen and joints. For example *Crocus sativus* L. (Saffron) and *Cinnamomum camphora* (L.) N. et Ebern. (Camphre) were reported for specific delivery of cardiac drugs to heart without affecting it.

Conclusions: Traditional Iranian Pharmacy is a science concentrates on nature, quality, dosage forms, adverse effects, delivery and targeting of natural drugs. It is proposed that rational combination use of natural drugs based on our knowledge of Traditional Iranian Pharmacy can be advantageous for an optional drug delivery to reduce probable side effects of an individual natural resource and to lower dosing size.

Keywords: Drug Delivery System; Traditional Iranian Pharmacy; Review