

International Conference on Geriatrics & Gerontology

July 08-10, 2014 DoubleTree by Hilton Hotel Chicago-North Shore Conference Center, USA

Novel Melt in Mouth ODT in Geriatric Patient's Compliance

Abhay Asthana

Maharishi Markandeshwar University, India

Majority of pharmaceutical dosage forms are intended for direct ingestion via oral route. This includes conventional as well as chewing that imposes problems to geriatric patients. The alternative options such as syrups and suspension forms are non-desirable due to use of sugar base, additional excipients to mask taste and stability issues. Further, in geriatric patients suffering from psychiatric issues, hospitalization or bedridden conditions with chronic ailments finds difficult to swallow solid oral dosage. The present research focuses on addressing these basic issues, critical in old age patients, through various approaches in development of melt in mouth orodispersible tablets (MMODTs). MMODTs are solid dosage forms that provide rapid disintegration and wettability to present as solution or suspension. MMODT disintegrates in the oral cavity with limited salivary fluid. The present technology is being designed for hydrophilic as well as hydrophobic drugs. In case of hydrophobic drugs it acts as a fast disintegrating tablets whereas, where drug is hydrophilic then it behaves as fast dissolving tablets. The approach in the development of MMODT is the appropriate selection and use of superdisintegrants in formulations supporting uniform dispersion. The drug can be rapidly dissolved in saliva and absorbed through biomembrane, during deglutition, unless it is protected from pre-gastric absorption. Tablets prepared with hydrophobic drug using cross carmellose sodium exhibited least friability and disintegration time less than 30 seconds, whereas in case of hydrophilic drug less than 25 seconds. The investigations using various categories and drug types have been carried to present an acceptable old aged compliant dosage form.

Biography

Abhay Asthana has completed his Ph.D at the age of 32 years from Dr. H. S. Gour University, Sagar and thereafter was associated with R&D departments of Matrix Labs Ltd, Hyderabad, India (Mylan, USA) and Torrent Pharmaceuticals Ltd., Ahmedabad, India. He is the Professor of Pharmaceutics, at MM University, Mullana-Ambala 133207 (India). He has published more than 27 papers in reputed peer reviewed journals, with high impact factor and bearing excellent citation index above 1200 and impact factor 69. Presently Abhay is Professor of Pharmaceutics at M.M. University, Mullana-Ambala (Haryana) 133207, India.