

To identify the concentration level of various pigments & to determine suitable solvent system for different lipstick samples by using TLC

Sonal Srivastava, Kapil Verma and Jyoti Singh

Forensic Science, Amity Institute of Forensic Sciences (AIFS), Amity University, India

30 lipstick samples of different brands of similar color were selected for this study. Coloring agent was analyzed by thin layer chromatography (TLC) and UV. Using four different solvent systems [Toluene/Benzene (12:8), Toluene/Acetone (16:4), Toluene/Benzene/Cyclohexane (4:12:4), Toluene/Benzene/Diethyl ether (12:6:2)]. lipstick samples of colors indistinguishable on visual observation could be grouped into eight subgroups. The work that follows goes on this line of investigation. The study compares the usefulness of two kinds of fluorescent reagents - Yellowescent Fluorescent Latent Prints Powder and Nile Red- for developing latent lip prints, older than one and a half year, on multi colored surfaces. The reagents were used in powder form and luminescence was observed by an alternate light source and ultraviolet light. In principle Nile Red, like lysochromes, have advantage over other Fluorescent powders because react with fats and physical agents.

The main purpose of this study is to identify concentration level of various pigments & to determine which solvent system is best for the particular brand of the lipstick using Thin Layer Chromatography by checking the differences in the respective chromatogram & UV.

forensic.kapilalert@gmail.com

Formulation and evaluation of bilayered floating tablets of metformin hydrochloride

Karthik Kumaran.T, Palanisamy.P, B.H.Venkateshwralu and Margret Chandira.Rjayakar.B

Vinayaka Mission's College of Pharmacy, India

Diabetes is a chronic metabolic disease characterized by high glucose levels in the blood. Sustained release gastro retentive dosage forms enable prolonged and continuous input of the drug to the upper parts of gastrointestinal tract and improve the bioavailability of medication that is characterized by narrow absorption window. Gastro retentive floating drug delivery systems (GFDDS) of Metformin Hcl, an antidiabetic drug with an oral bioavailability of only 50% (because of its poor absorption from lower gastrointestinal tract) have been designed to increase its residence time in the stomach without contact with the mucosa was achieved through the preparation of floating bilayer matrix tablet by direct compression technique, by using HPMC as release retardant, and NaHCO₃ as gas generating agent to reduce floating lag time. Bilayer Floating tablets were evaluated for Hardness, Friability, Weight Variation, Drug content, Floating properties and In-vitro release pattern. The In-vitro drug release followed Zero order Kinetics and drug release was found to be diffusion controlled.

karthikvmcp@gmail.com