Abstract

A sensitive high-performance liquid chromatographic method has been developed for the simultaneous determination of the three licensed HIV-protease inhibitors indinavir, saquinavir and ritonavir. An aliquot of 500??1 plasma, spiked with internal standard, was extracted with 0.5ml 10%NH4OH and methyl tert-butyl ether. After evaporating, the residue was dissolved in eluent consisting of acetonitrile-50mM phosphate buffer (40:60,v/v). Subsequently, the eluent was washed with hexane. Chromatography was performed using a C18 reverse-phase column and acetonitrile-50mM phosphate buffer (45:55,v/v) for analysis. The method was validated extensively and stably tests under various conditions were performed. The assay is now in use to analyze plasma samples from patients treated with HIV-protease inhibitors.

Key Word: Indinavir \ Saquinavir \ Ritonavir