

Analysis of RS-Ibuprofen with circular dichroism (CD) detector

Ibuprofen is a non-steroidal drug with anti-inflammatory and fever reducing properties, used to treat colds and relieve pain.

In the present report, RS-ibuprofen was detected using a dedicated HPLC circular dichroism detector.

Fig. 1 shows the RS-ibuprofen optically resolved CD chromatogram and the simultaneously detected UV chromatogram from the CD-1595.

Fig. 2 shows the CD and UV chromatograms of a sample extracted from a commercial cold medication.

Keywords: 1.Ibuprofen, 2.STD, Cold tablet, 3.CHIRALCEL OD, 4. Circular dichroism detector, 5 .Chiral separation

Conditions:

Column:	CHIRALCEL OD (4.6mm I.D. x 250mmL)
Eluent:	n-Hexane/ IPA/ TFA (100/1/0.1)
Flow rate:	1.0ml/min
Column temperature:	25 degree celsius
Sample:	RS-Ibuprofen (0.1mg/mL) Cold tablet
Injection volume:	10uL
Circular dichroism detector (CD-1595)	
Wavelength:	235nm
Scale:	1mV =1mdeg
Response:	Standard
Polarity:	+

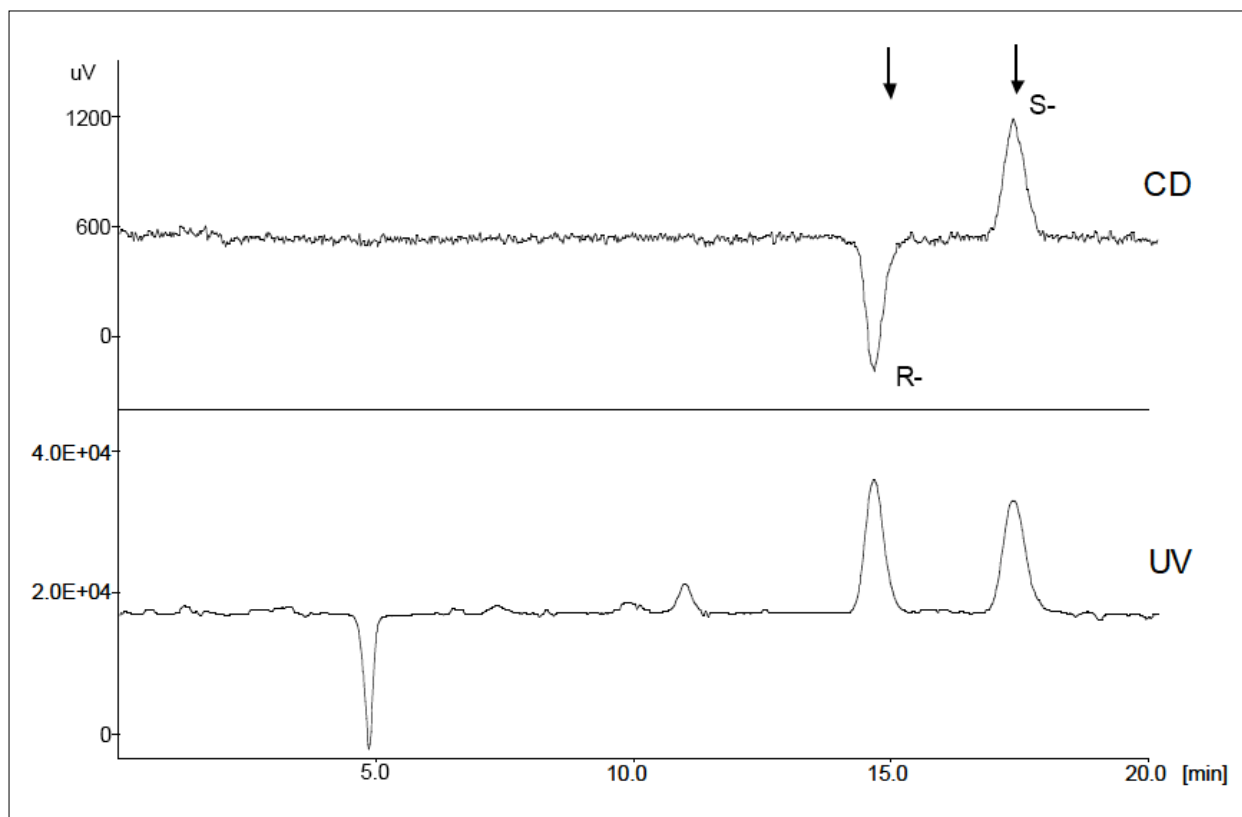


Fig. 1 CD and UV chromatograms of RS-ibuprofen

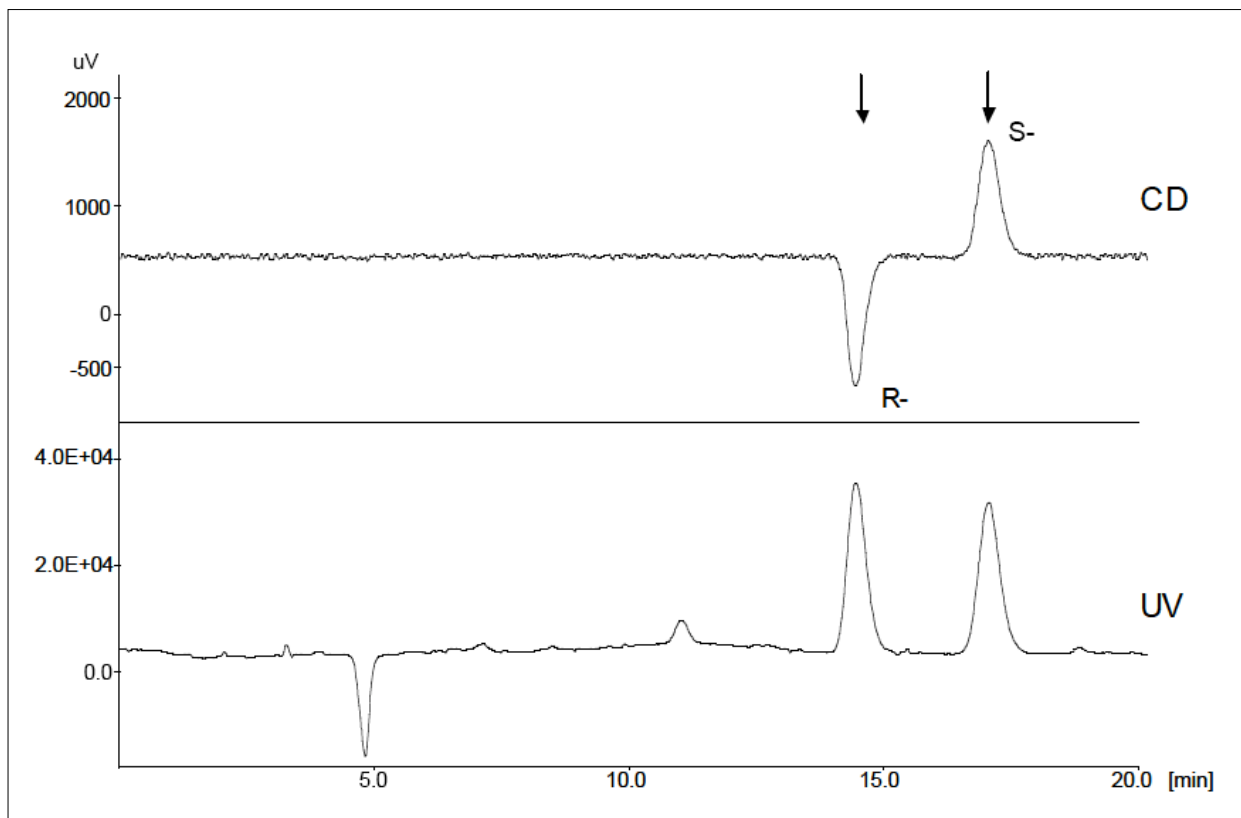
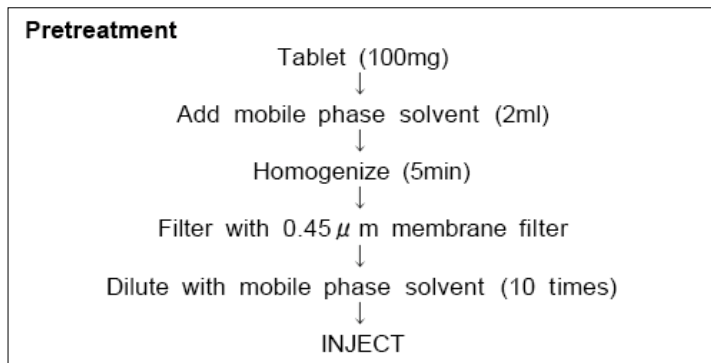


Fig. 2 CD and UV chromatograms of cold medication