Moxonidine Tablets – BP 2020

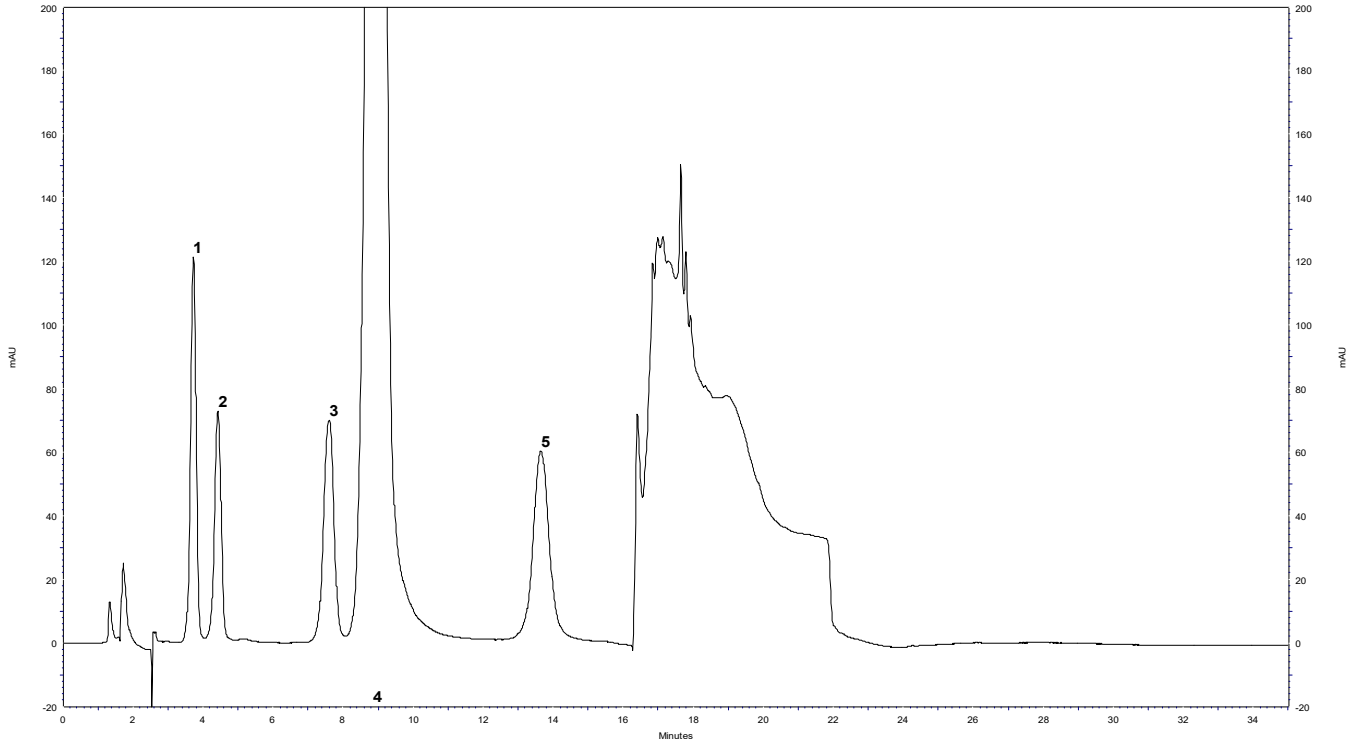
These chromatograms are provided for information only as an aid to analysts and is intended as guidance for the interpretation and application of BP monographs.

Typical chromatogram for the Identification test for Moxonidine Tablets by Thin Layer Chromatography as published in BP 2020.

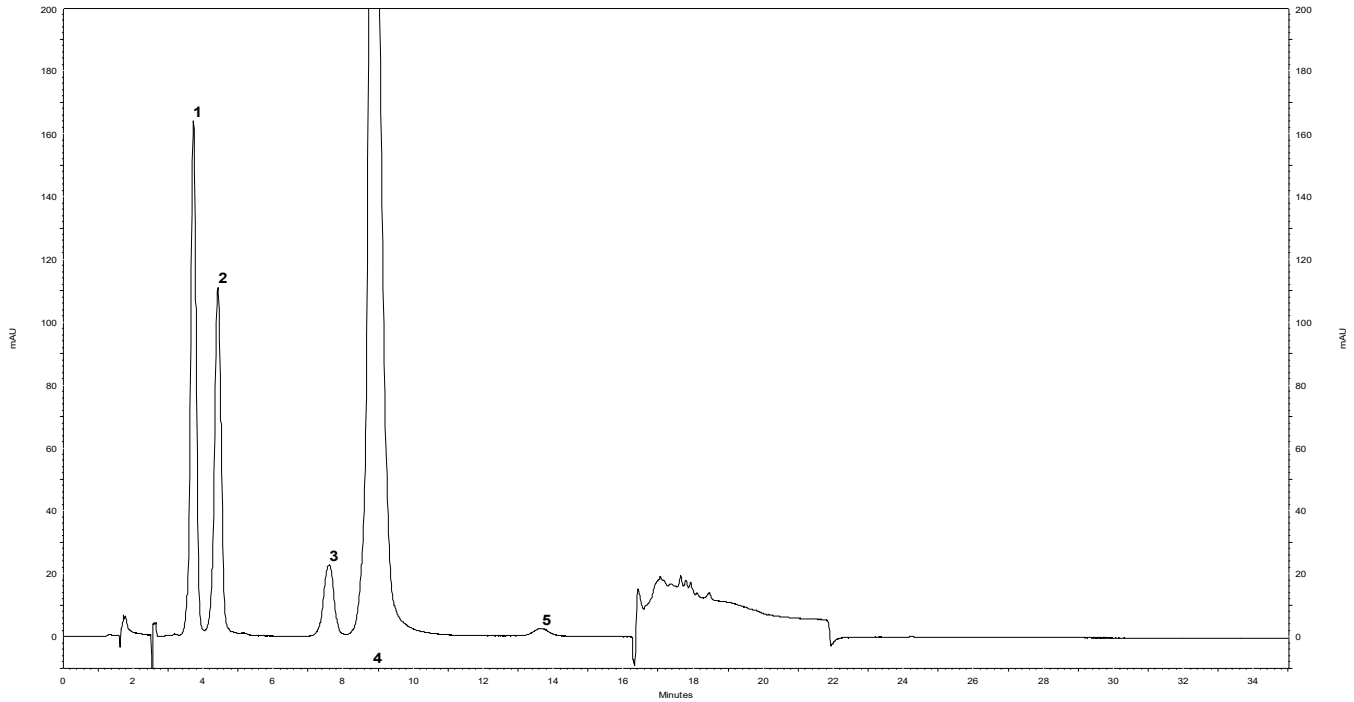
1	Blank
2	0.02 % w/v moxonidine standard
3-9	0.02 % w/v tablet sample solution

TLC plate	Merck TLC silica gel 60 F_{254} Plate, 20 cm × 20 cm
Plate preconditioning	N/A
Diluent	Methanol
Mobile Phase	Triethylamine: methanol: toluene (0.1: 4: 6, v/v/v)
Mobile Phase volume	101 mL
Band application	3 mm band size with a spotting volume of 10 µL
Chamber saturation	Minimum 60 minutes at room temperature
Development	150 mm
Development time	48 minutes
Drying time	30 minutes in air
Derivatisation	N/A
Visualisation	Developed plate examined under UV light (254 nm)

Typical chromatogram for solution (4) in the Related Substances test for Moxonidine Tablets as published in BP 2020.



Peak ID 230 nm: 1: Impurity D; 2: Impurity C; 3: Impurity A; 4: Moxonidine; 5: Impurity B



Peak ID 280 nm: 1: Impurity D; 2: Impurity C; 3: Impurity A; 4: Moxonidine; 5: Impurity B

Column : LiChrospher RP-Select-B 60 (250 mm x 4.0 mm, 5 µm)
Method Ref. : Related Substances for the Moxonidine Tablets monograph from BP 2020
Buffer : 3.84 g/L sodium pentane sulfonate monohydrate, pH 3.5
Mobile Phase A : Acetonitrile
Mobile Phase B : Buffer
Gradient :

Time (min)	Mobile Phase A (%)	Mobile Phase B (%)
0-14	14	86
14-15	14-90	86-10
15-20	90	10
20-21	90-14	10-86
21-35	14	86

Diluent : Methanol: buffer (50:50 v/v)
Flow rate : 1.2 mL/min
Column Temp : 40 °C
Injection Volume : 100 µL
Detection : 230 nm and 280 nm