
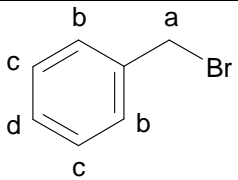


NMR SPECTROMETRY

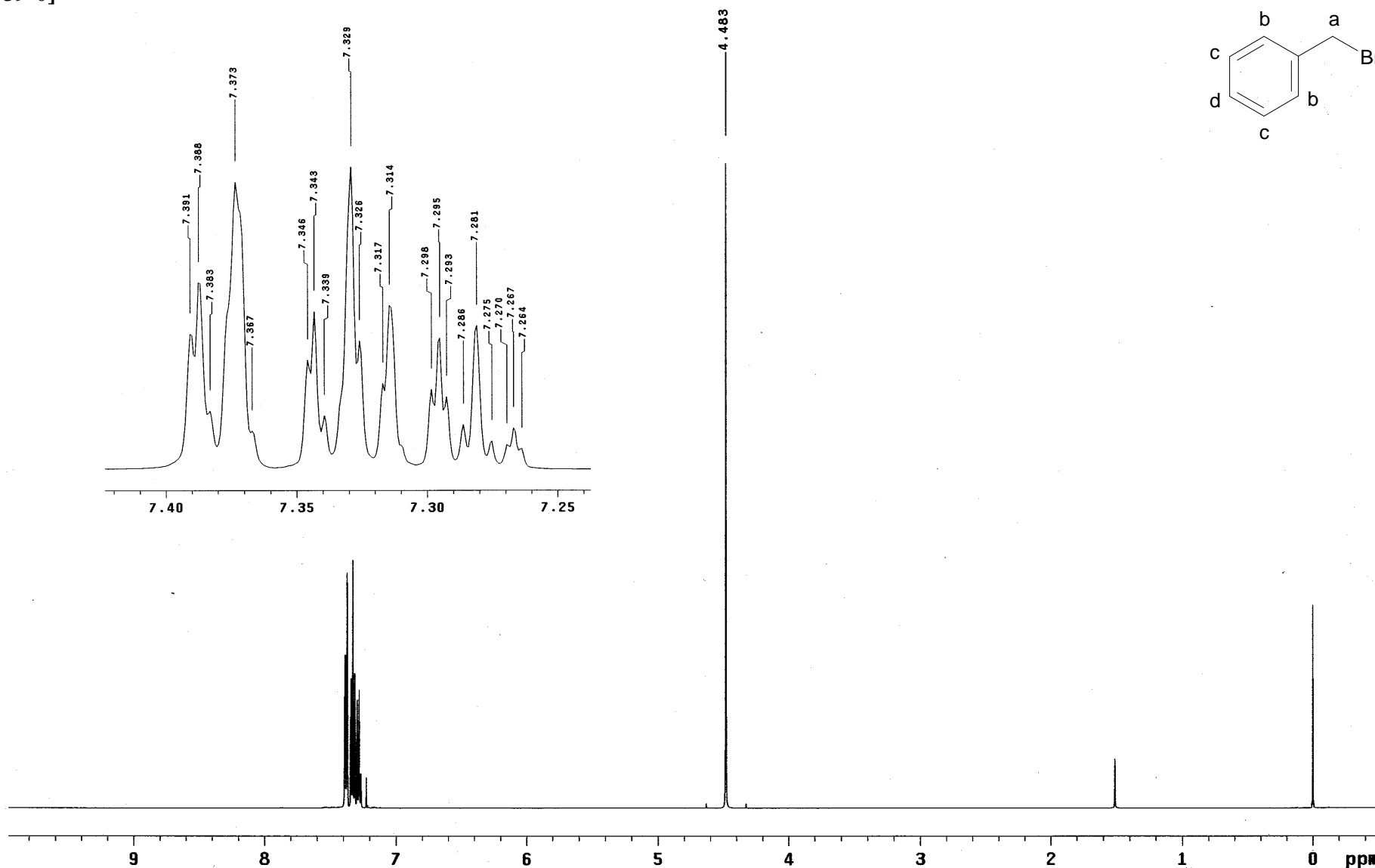
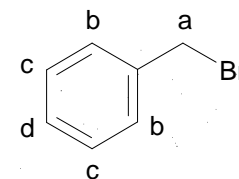
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|--|--|---------------------------------------|
| Contributor's name and address: | | Verification Laboratory |
| Secretariat identification code | 25-3-0013r (p1/2) | DSO National Laboratories |
| Signature |  | 11 Stockport Road Singapore 117605 |
| Chemical information: | | |
| Chemical name | Benzyl bromide | |
| Schedule number | | |
| CAS registry number | 100-39-0 | |
| Chemical structure with numbering of atoms |  | |
| Molecular formula | C ₇ H ₇ Br | |
| Sample information: | | |
| Sample purity | >98 % | |
| Sample concentration | 50 mg/mL | |
| Solvent | CDCl ₃ | |
| pH | - | |
| Source | Fluka | |
| Reference chemical shift (Internal) | TMS, 0 ppm | |
| Instrument information: | | |
| Manufacturer | Varian, Inc. | |
| Model | Inova 500 MHz | |
| Spectrometer frequency | 500 MHz | |
| Software version | VNMR version 6.1C | |
| Experimental information: | | |
| Nucleus measured | ¹ H | |
| Sample temperature | 25 °C | |
| Spectral width (Hz) | 5252.1 | |
| Data points in Fourier transformed spectrum | 32768 | |
| Repetition time | 12s | |
| Pulse angle (μs and degrees) | 3.462 μs, 45° | |
| Date of experiment | 1 Jun 2005 | |
| Data points in FID | 31480 | |
| Number of scans | 16 | |
| Baseline correction | Yes | |
| Spectral information: | | |
| Chemical shifts (ppm) assigned except for acidic protons | Ha = 4.48, Hb = 7.37 – 7.39, Hc = 7.31 – 7.35, Hd = 7.26 – 7.30 | |
| Coupling constants (Hz) | - | |

25-3-0013r (p2/2)

Benzyl bromide (C₇H₇Br)

[100-39-0]

¹H NMR



Res.Freq: 499.662 MHz
Solvent: CDCl₃
Temperature: 25°C
Concentration: 50 mg/mL
Reference: TMS (internal)

Spectral Width: 5252.1 Hz
Data points [FID]: 31480
Data points [Spectrum]: 32768
Pulse width: 3.462 μs, 45°
Number of Scans: 16

Line broadening: no
Rep. time: 12 s
Resolution: 0.3 Hz (TMS)
Baseline correction: Yes
Instrument: Varian INOVA 500

Nuc δ[ppm]
a: 4.48
b: 7.37 – 7.39
c: 7.31 – 7.35
d: 7.26 – 7.30