

Supplementary Material

Synthesis of C₂-symmetric carbohydrate-based macrocycles by introduction of methylene/*p*-xylene linkers

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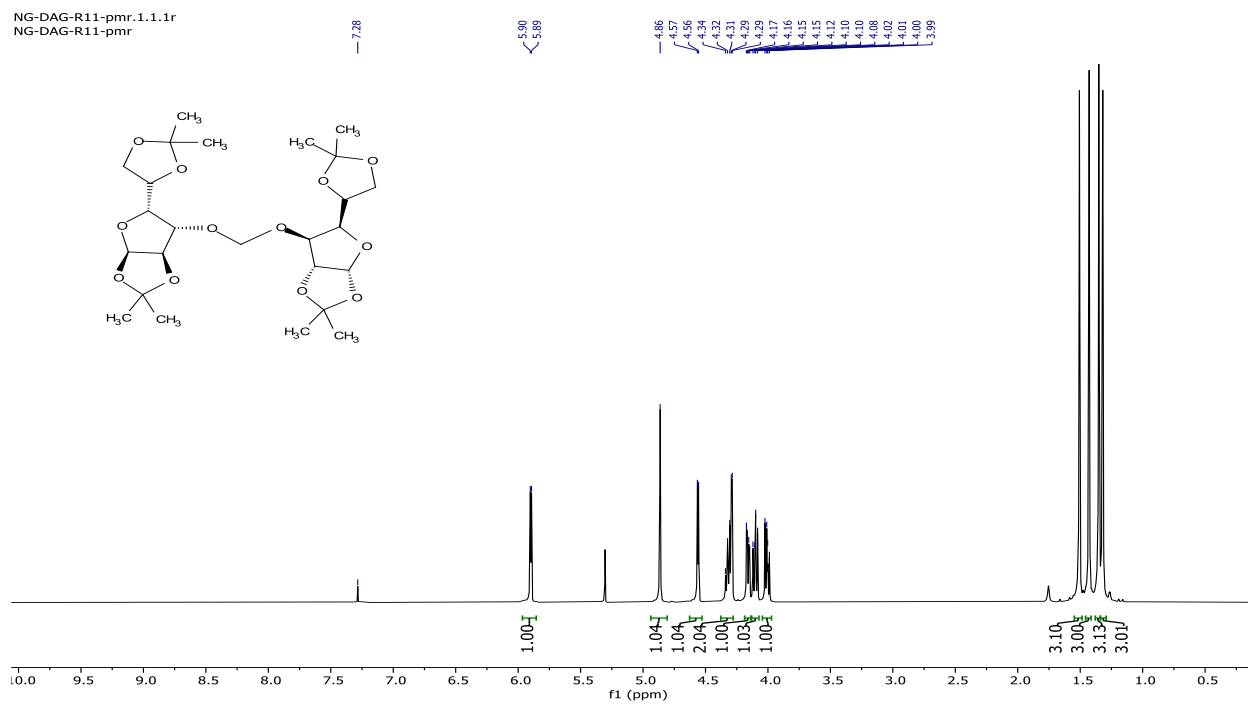
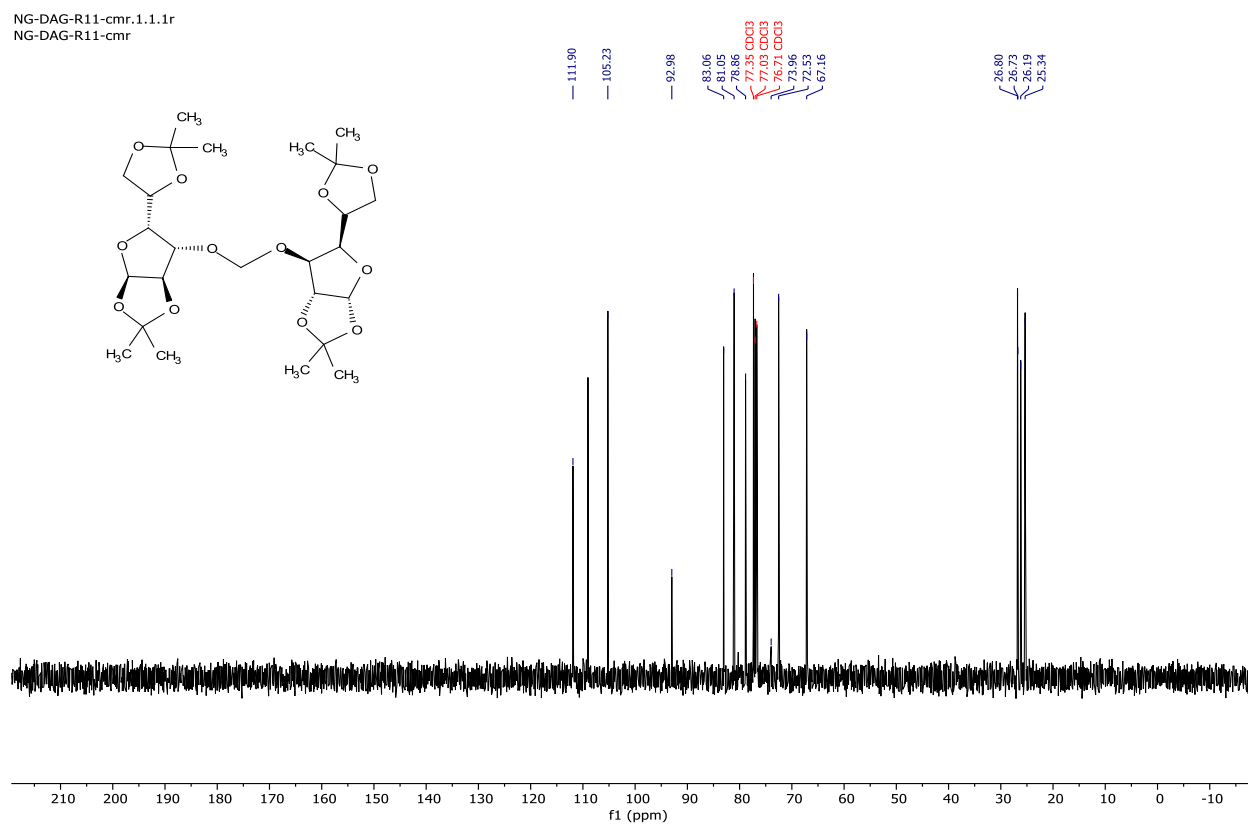
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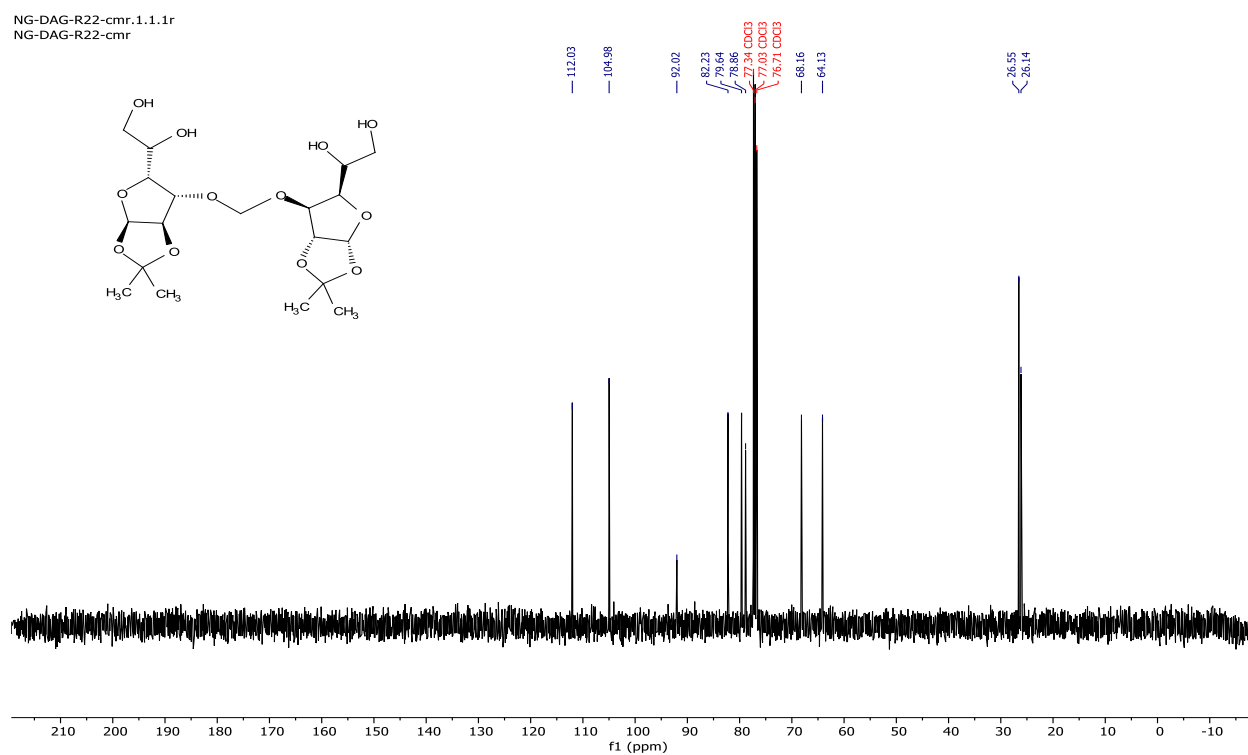
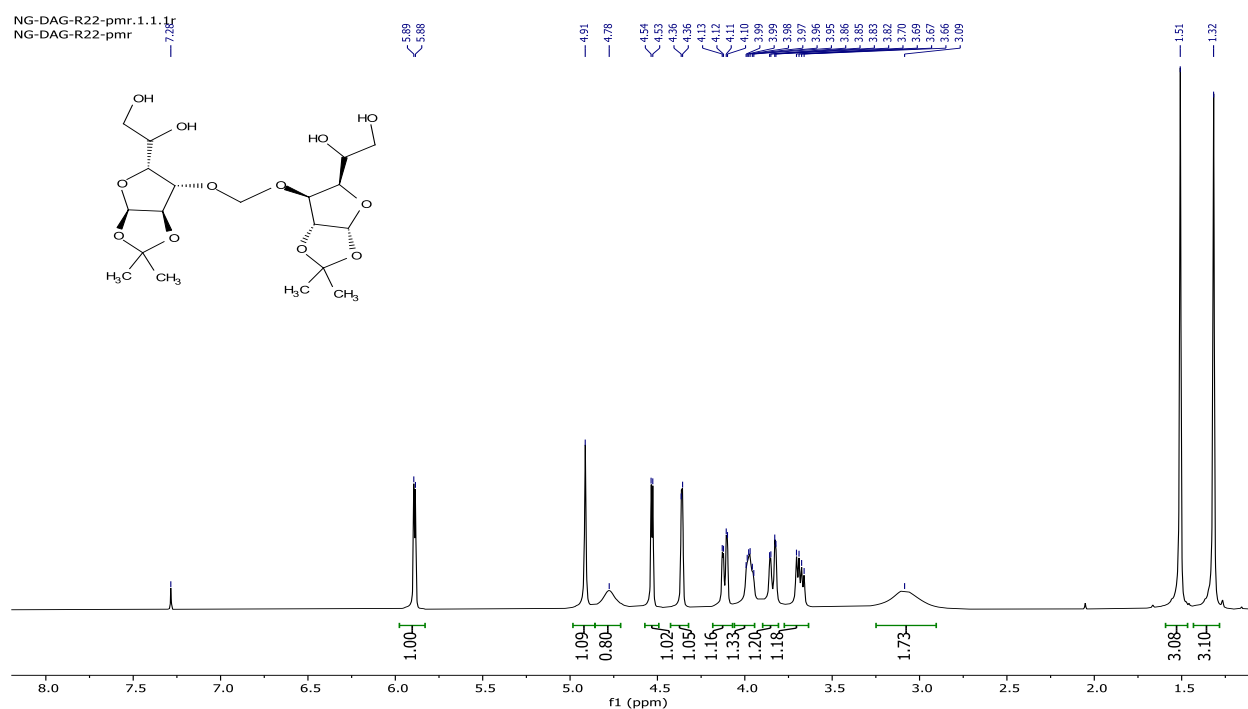
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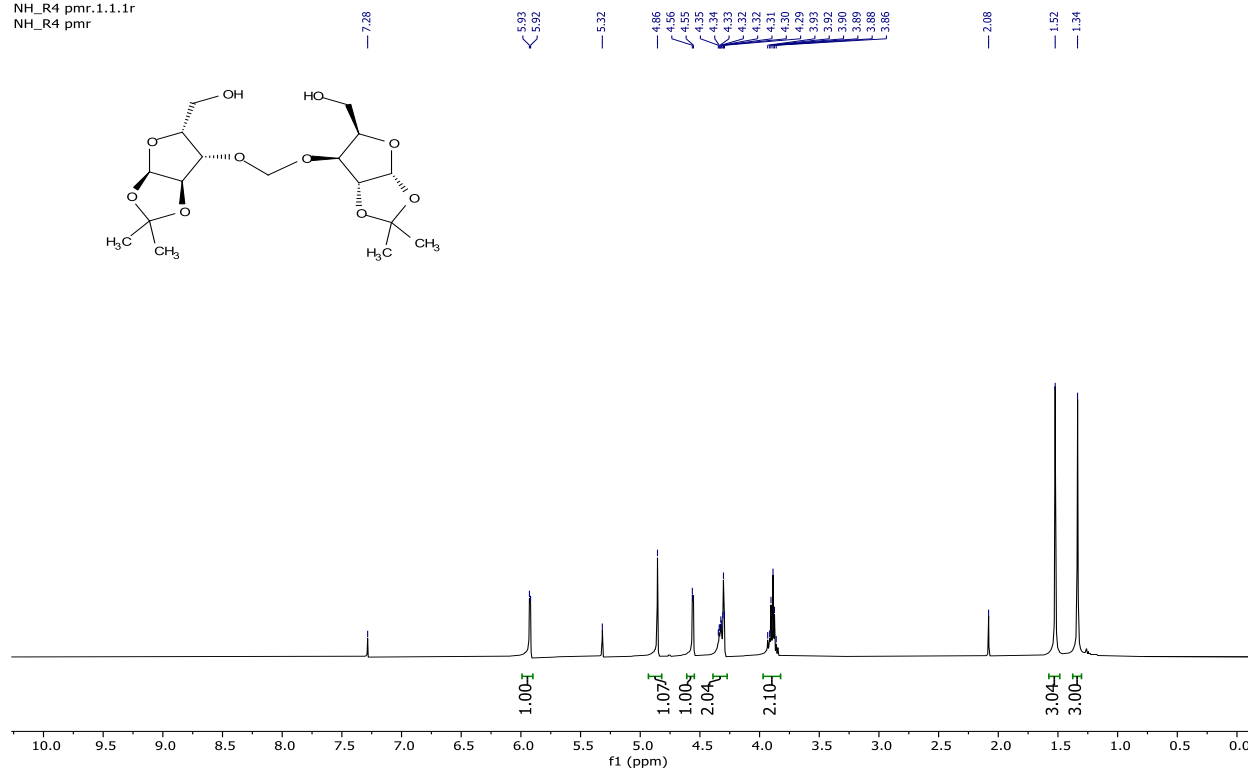
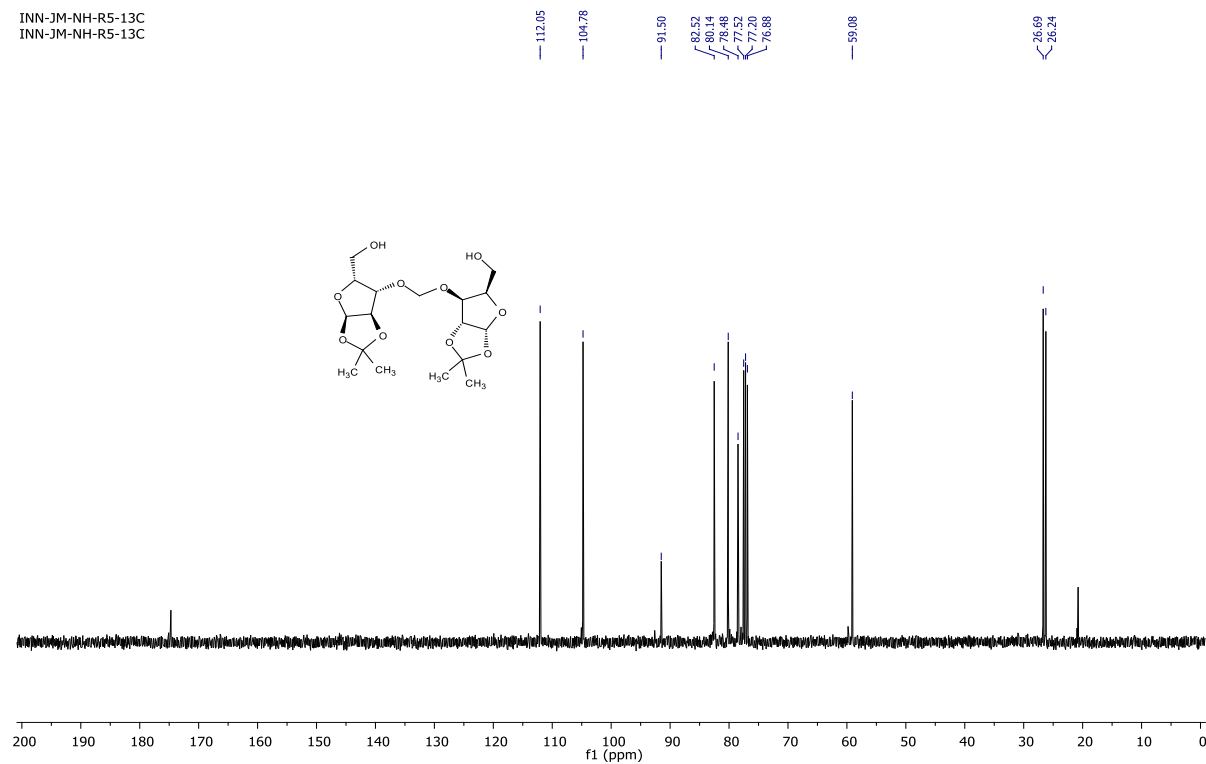
Email: jhimli.sengupta@gmail.com; bgroy@cus.ac.in

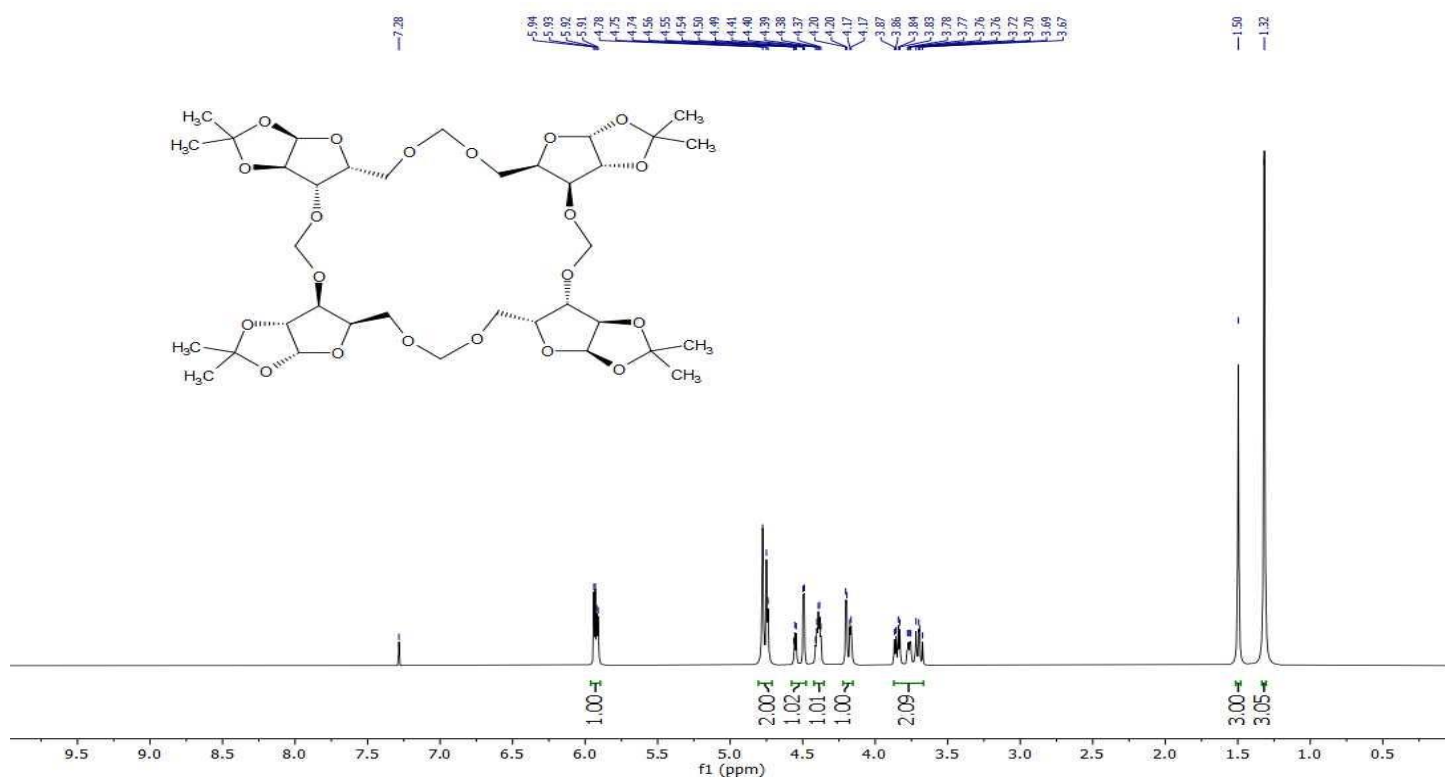
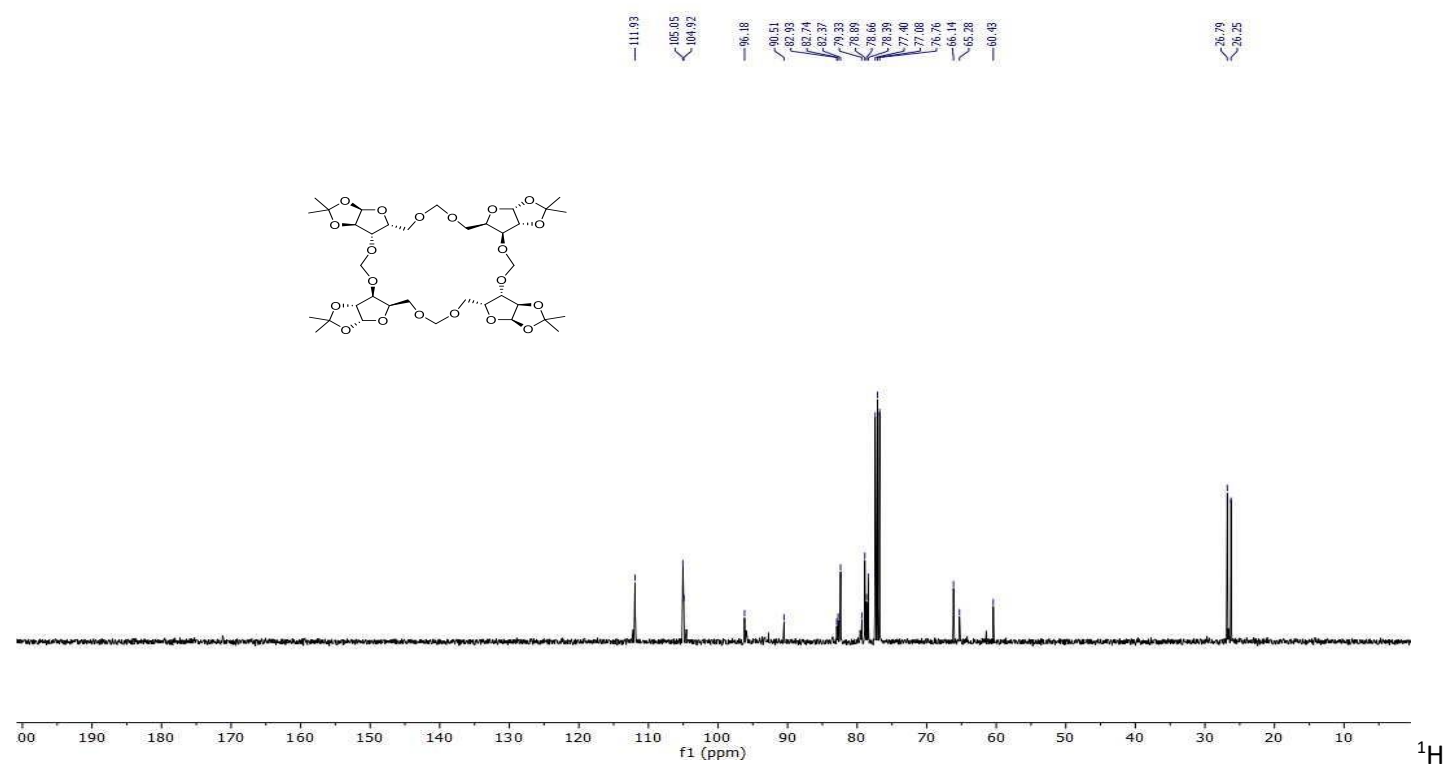
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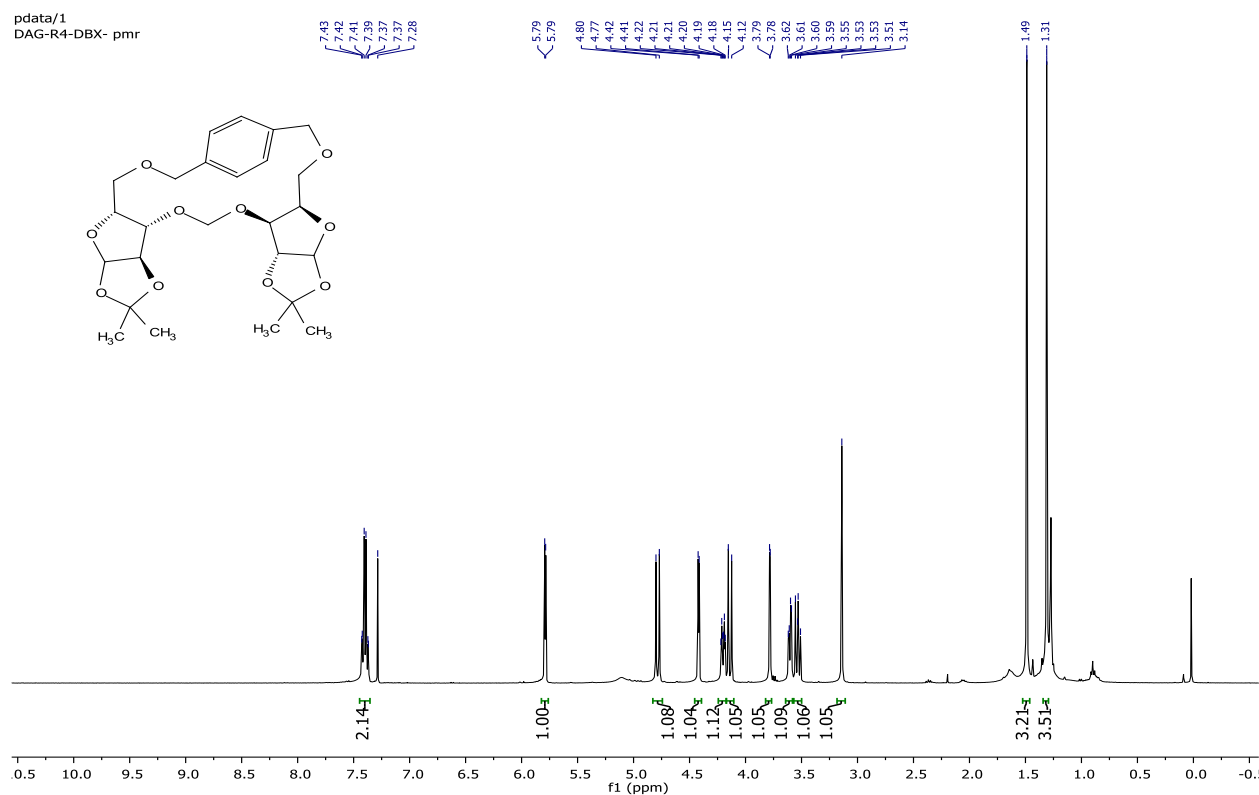
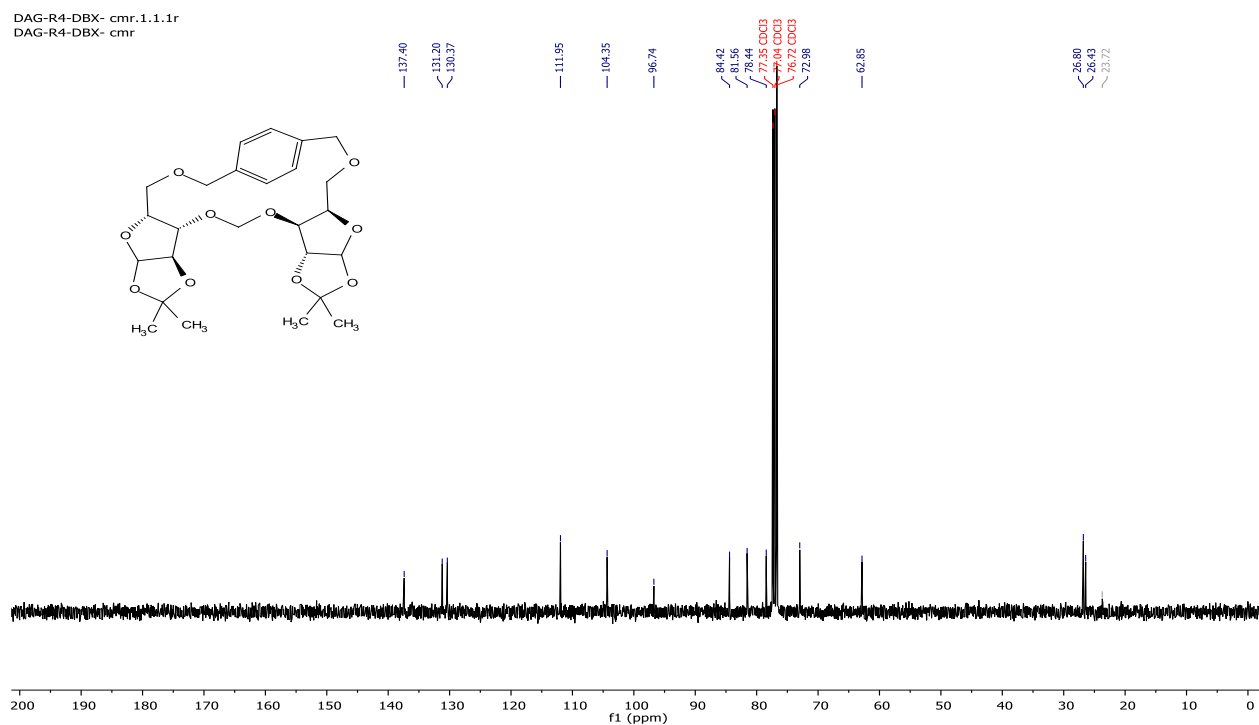
1. ¹ H NMR (400 MHz, CDCl ₃) of compound 2	
¹³ C NMR (100 MHz, Chloroform- <i>d</i>) of compound 2	S2
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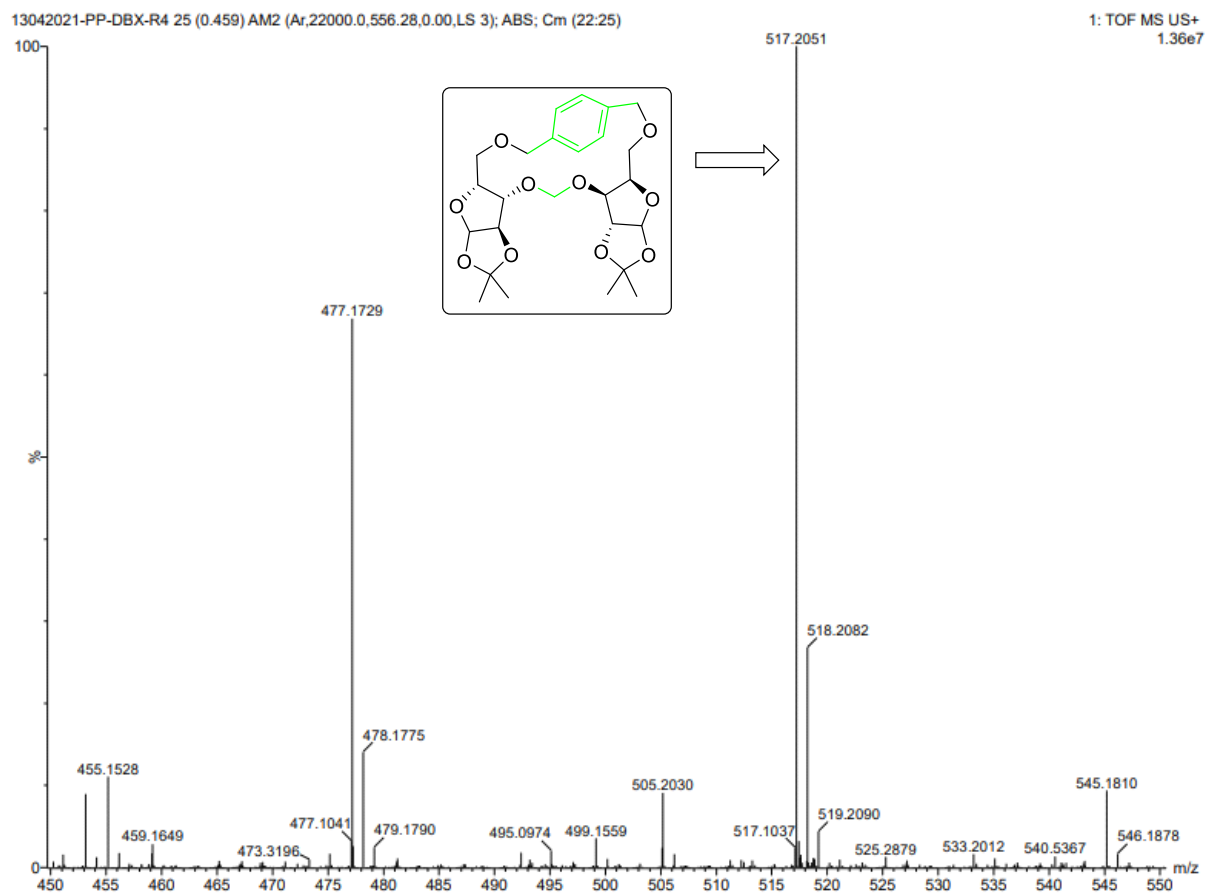
 ^1H NMR (400 MHz, $\text{Chloroform-}d$) of compound 2 ^{13}C NMR (100 MHz, $\text{Chloroform-}d$) of compound 2



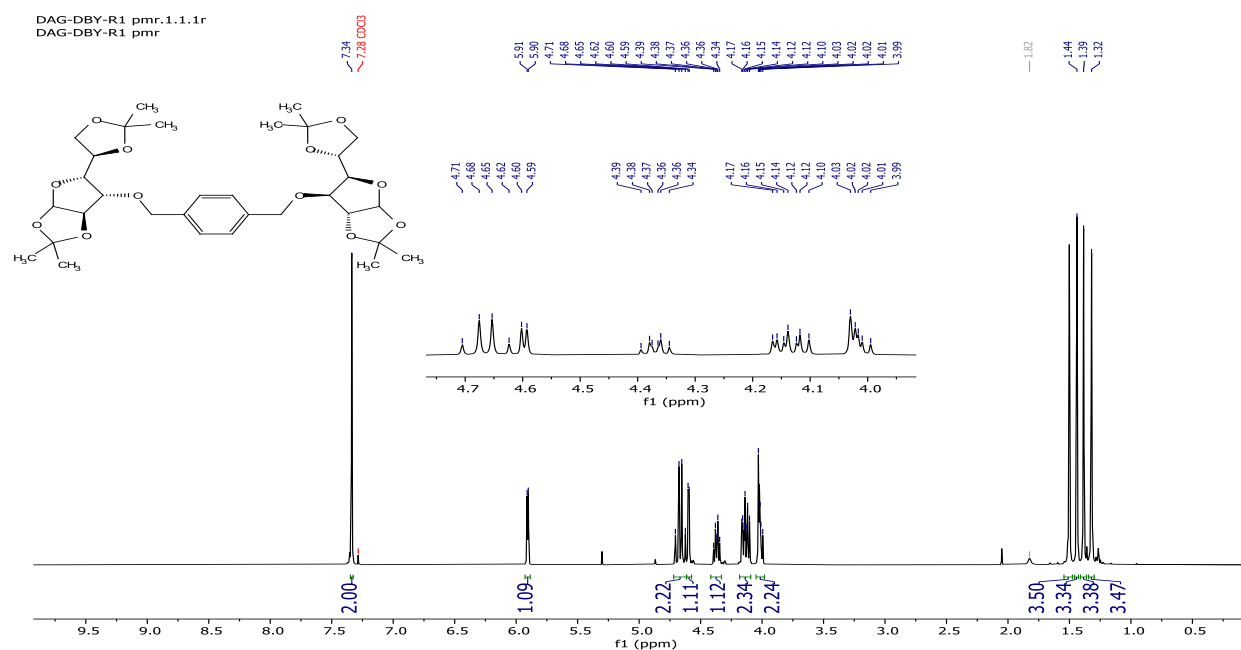
NH_R4 pmr.1.1.1r
NH_R4 pmr¹H NMR (400 MHz, Chloroform-*d*) of compound **5**INN-JM-NH-R5-13C
INN-JM-NH-R5-13C¹³C NMR (100 MHz, Chloroform-*d*) of compound **5**

NMR (400 MHz, Chloroform-*d*) of compound **CSM-1**¹³C NMR (100 MHz, Chloroform-*d*) of compound **CSM-1**

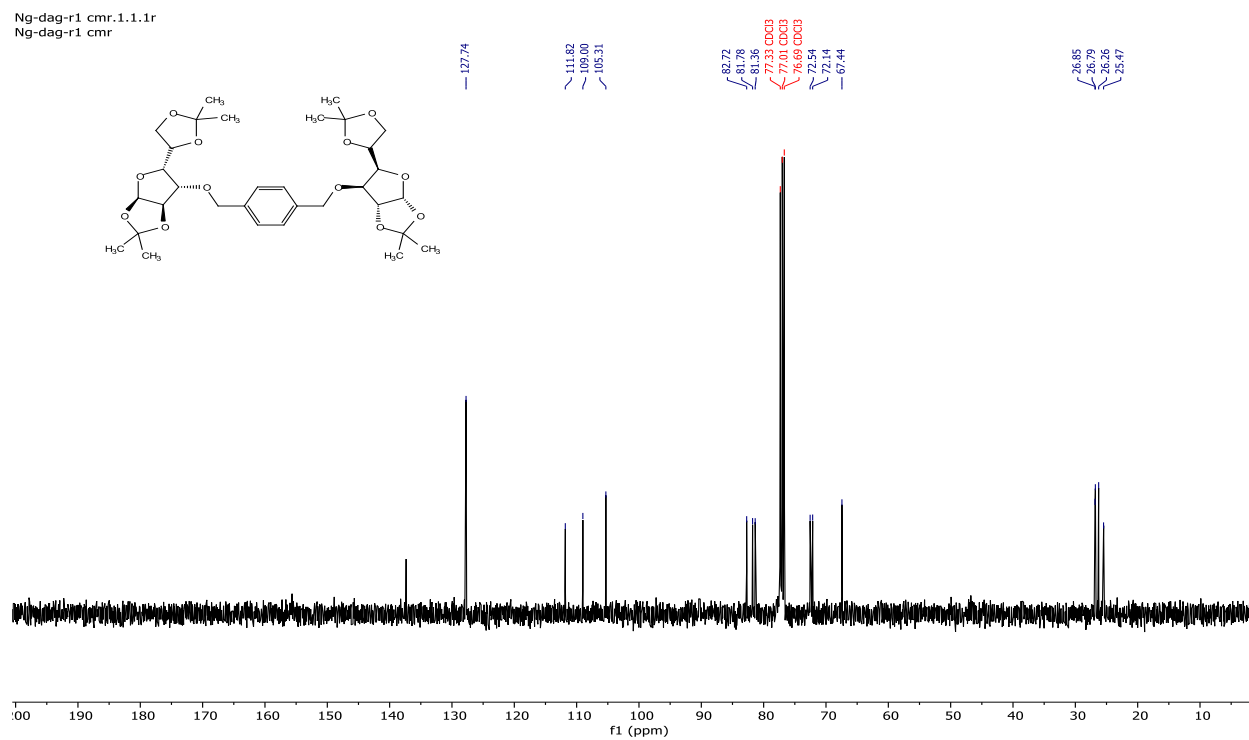
 ^1H NMR (400 MHz, Chloroform- d) of compound **CSM-2** ^{13}C NMR (100 MHz, Chloroform- d) of compound **CSM-2**



TOF-MS (US+) of compound **CSM-2**. (m/z: [M + Na]⁺ Calculated for **C₂₅H₃₄O₁₀** -**517.2050**; Found-**517.2051**)

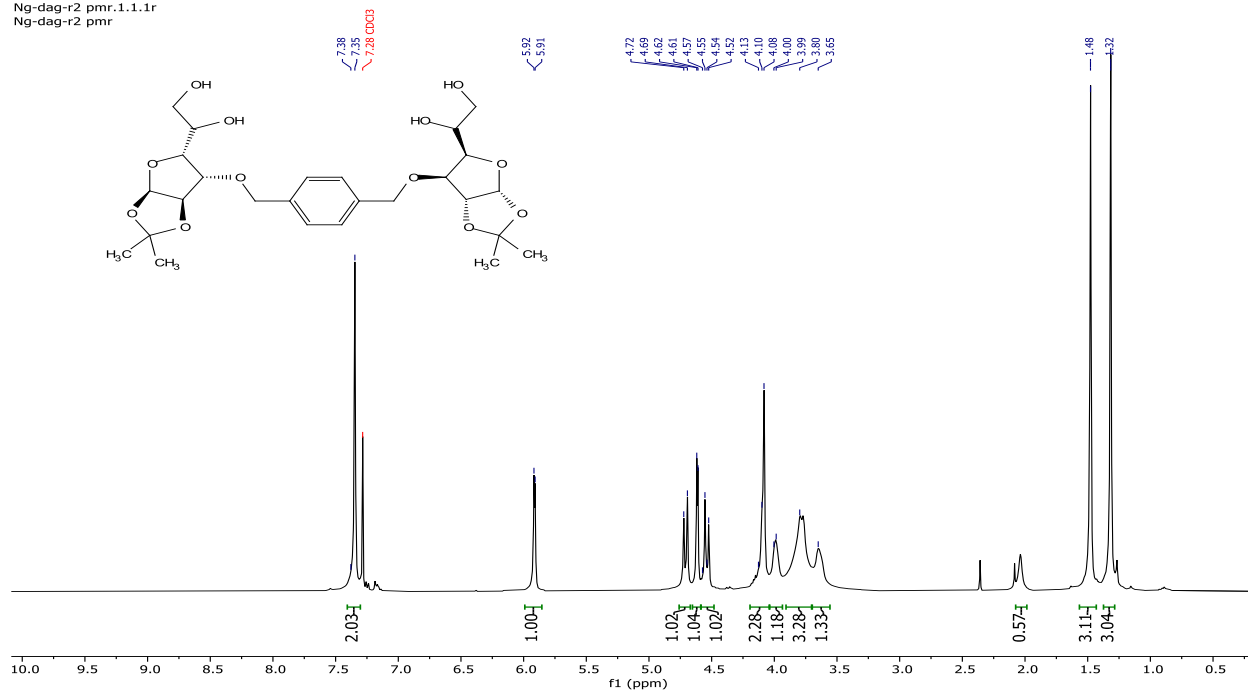


^1H NMR (400 MHz, CDCl_3) of compound **7**



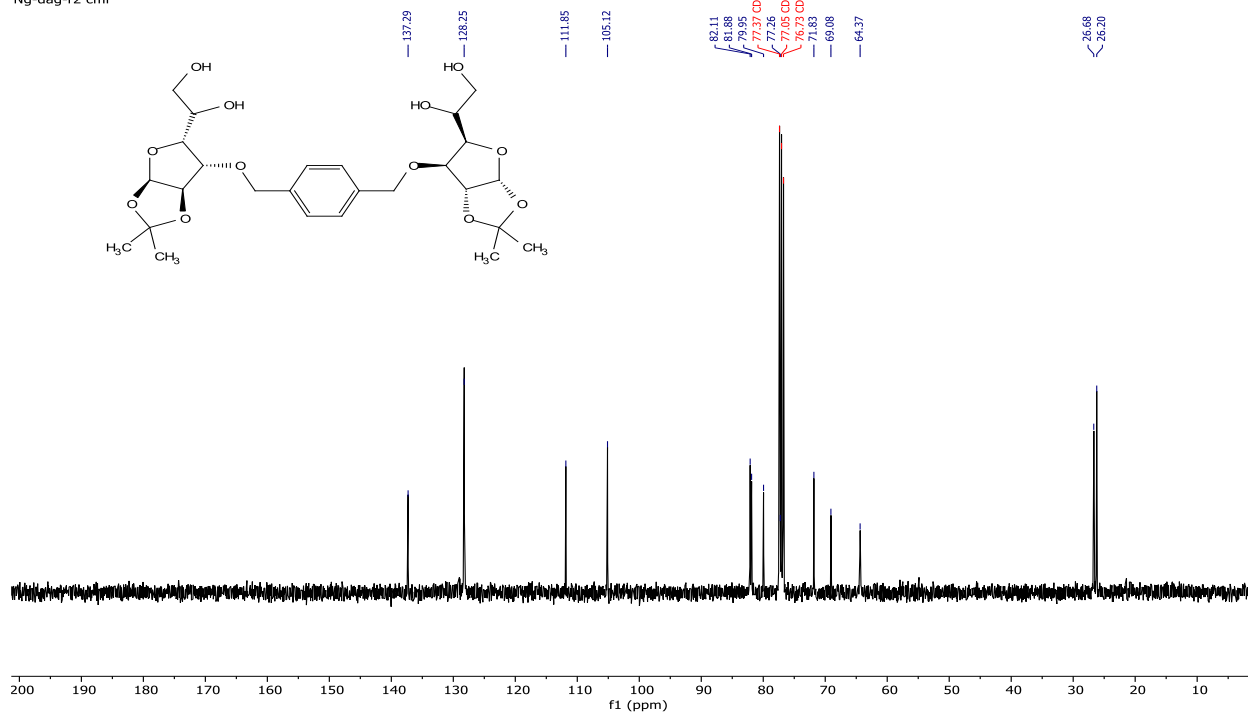
^{13}C NMR (100 MHz, CDCl_3) of compound **7**

Ng-dag-r2 pmr.1.1.1r
Ng-dag-r2 pmr

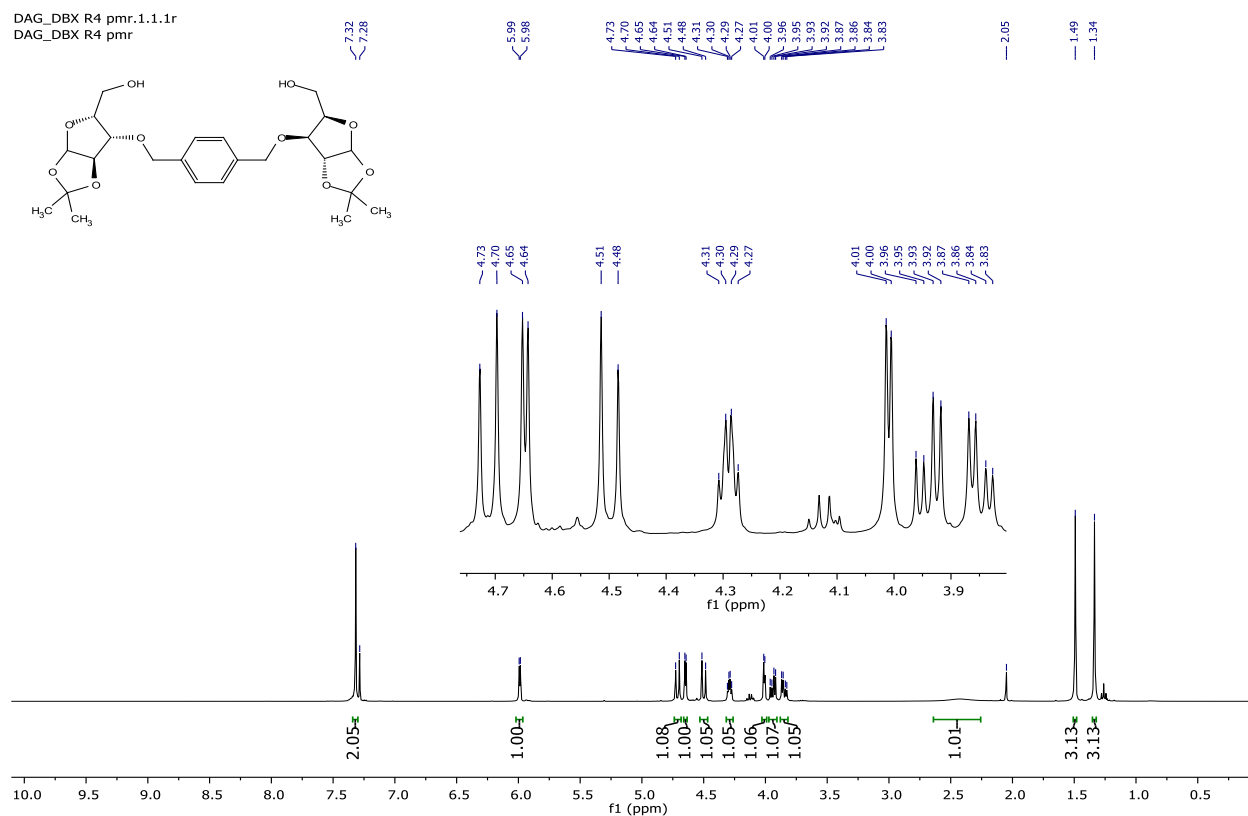


¹H NMR (400 MHz, CDCl₃) of compound **8**

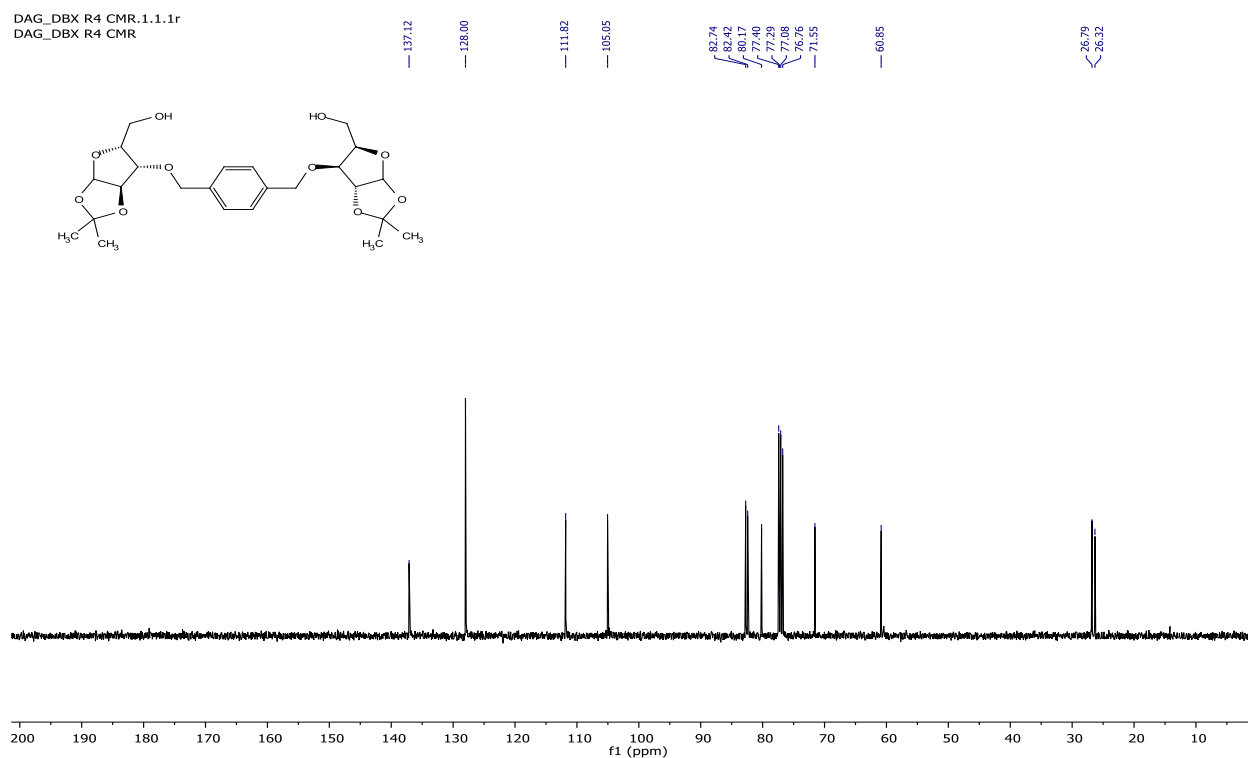
Ng-dag-r2 cmr.1.1.1r
Ng-dag-r2 cmr



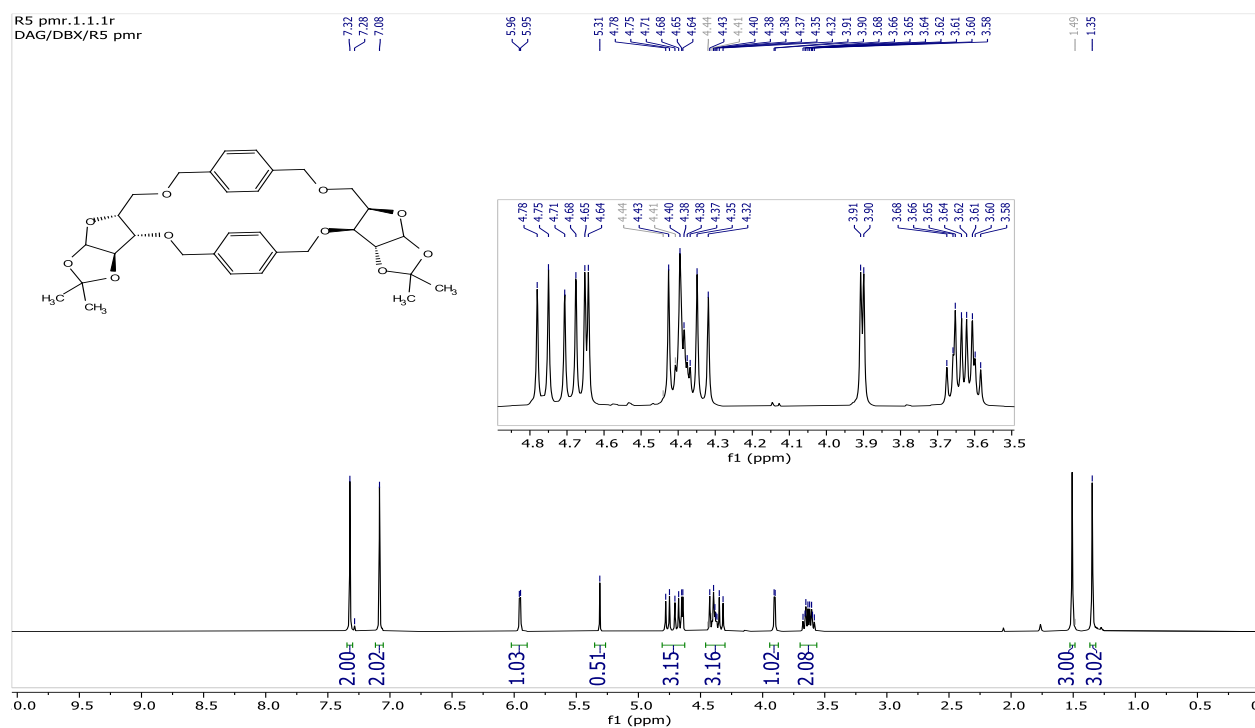
¹³C NMR (100 MHz, Chloroform-*d*) of compound **8**



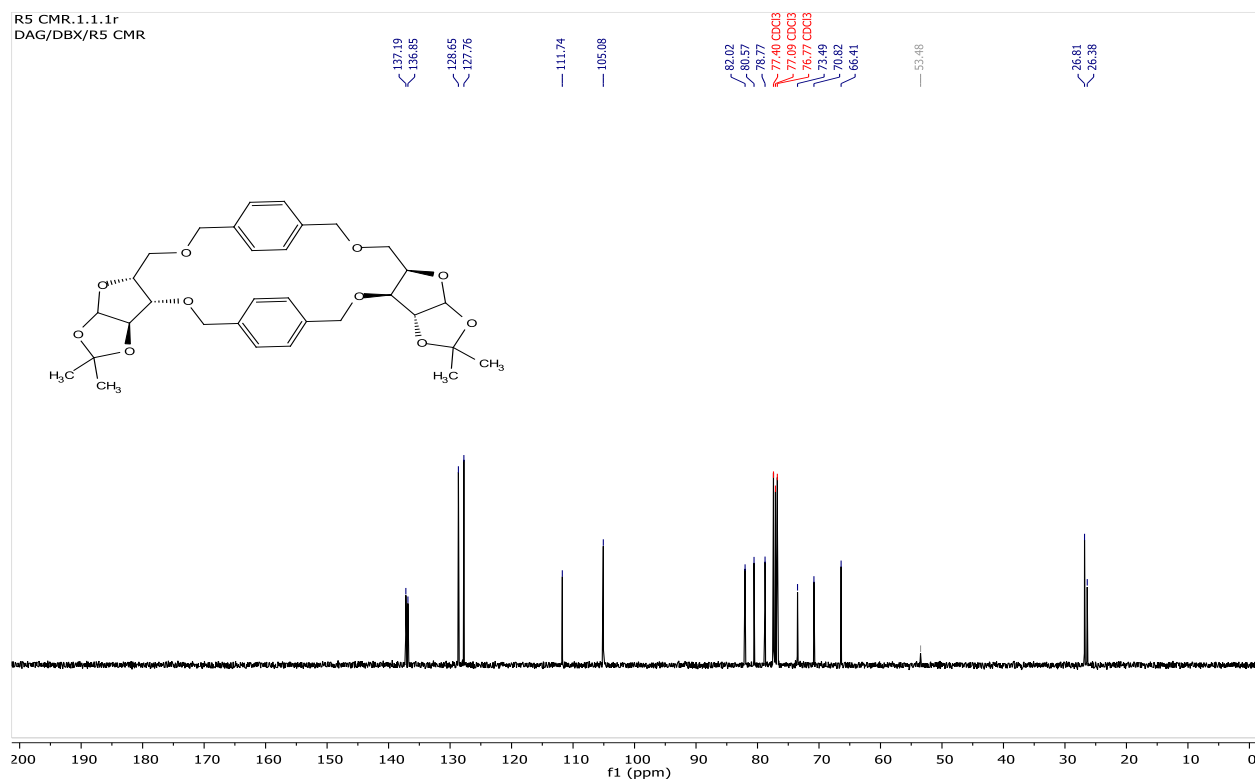
¹H NMR (400 MHz, Chloroform-*d*) of compound **10**



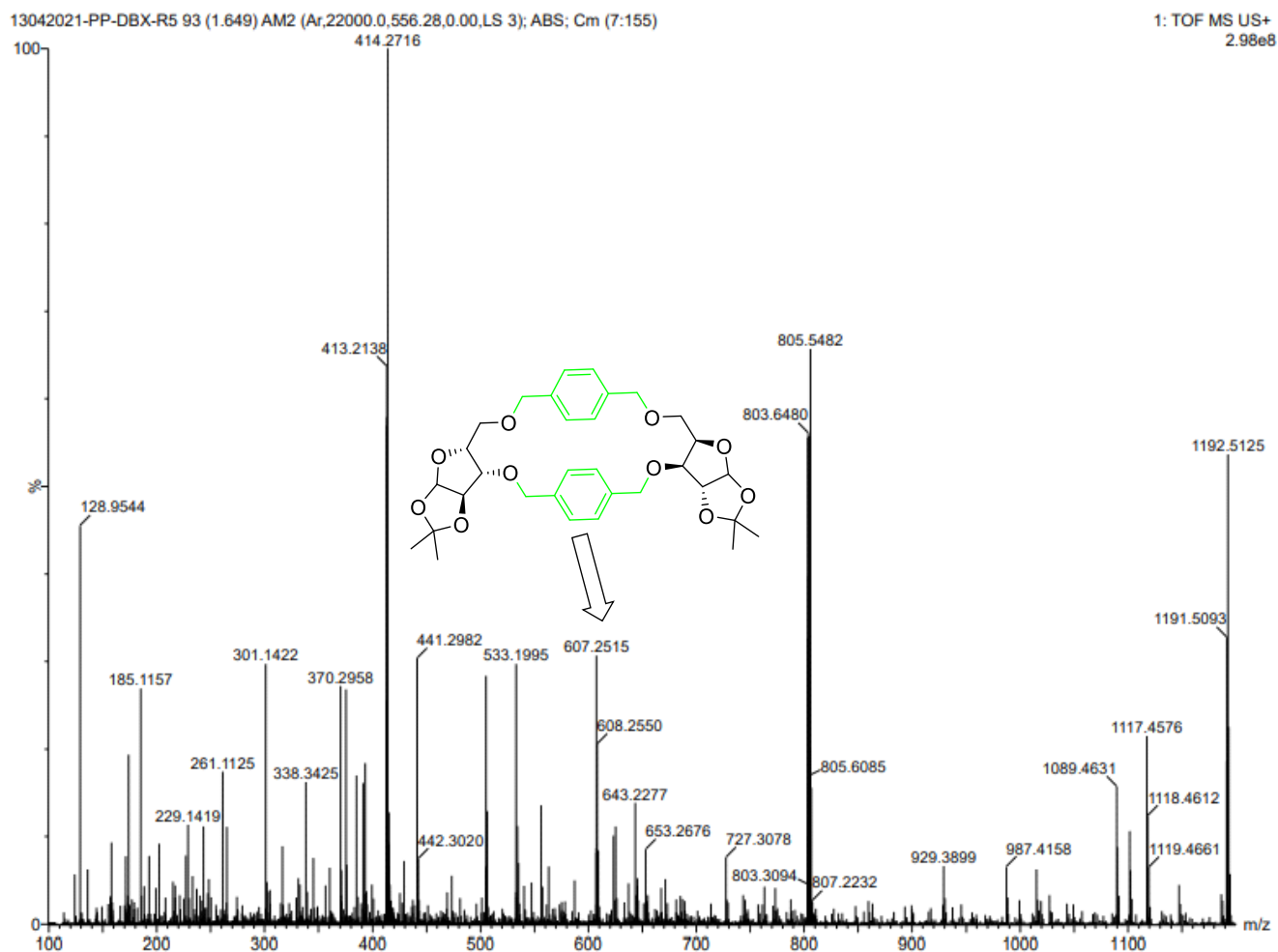
¹³C NMR (100 MHz, Chloroform-*d*) of compound **10**



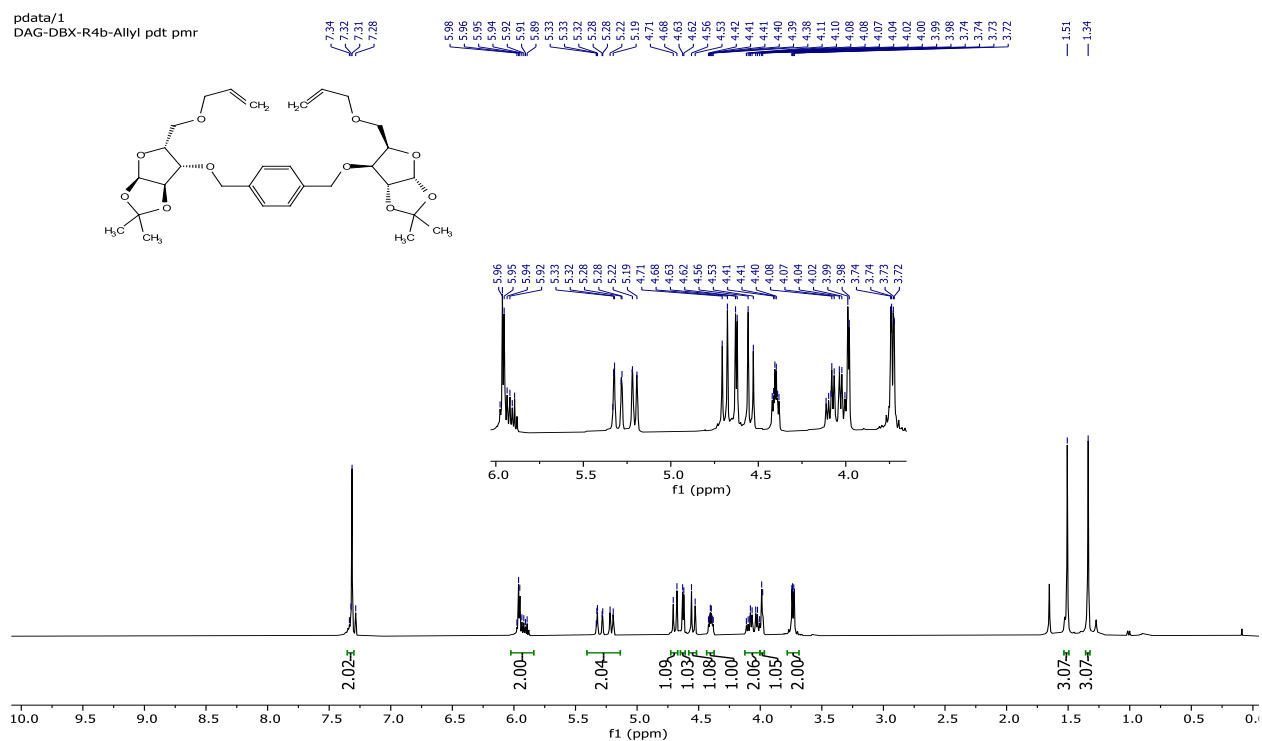
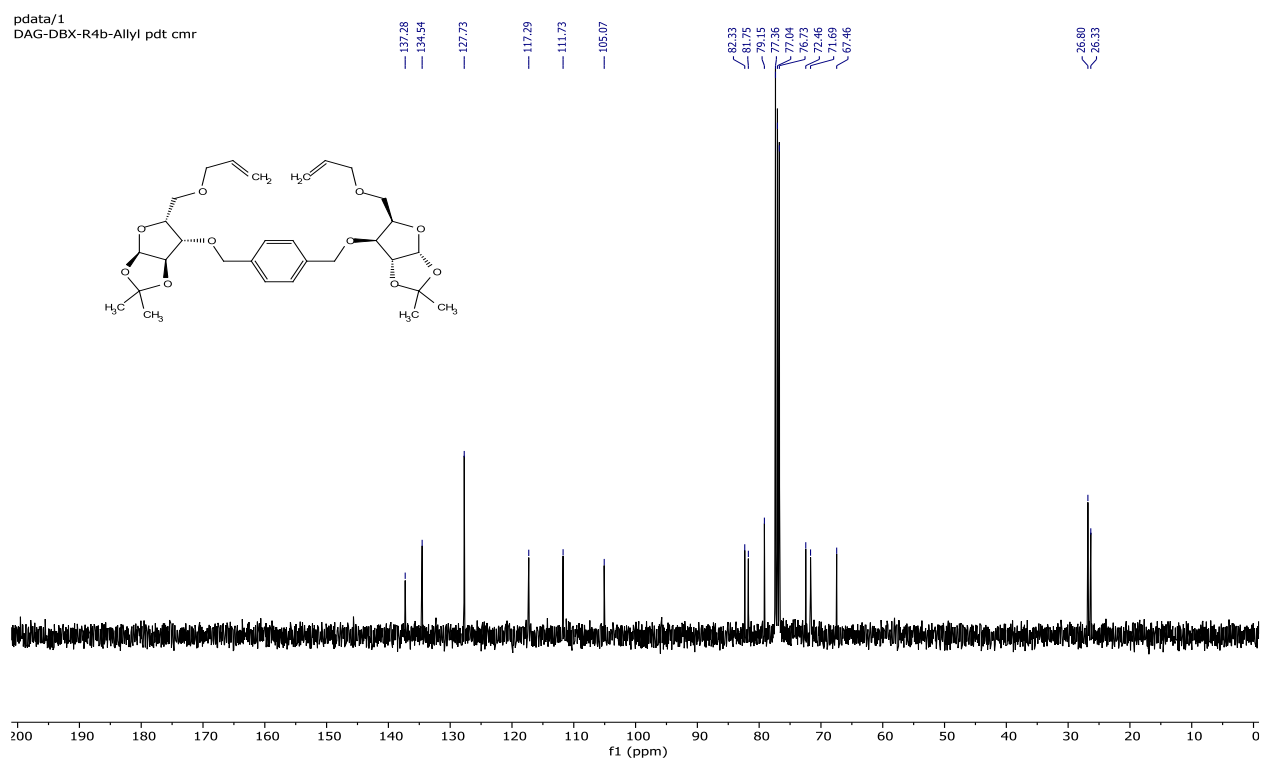
^1H NMR (400 MHz, Chloroform-*d*) of compound **CSM-3**

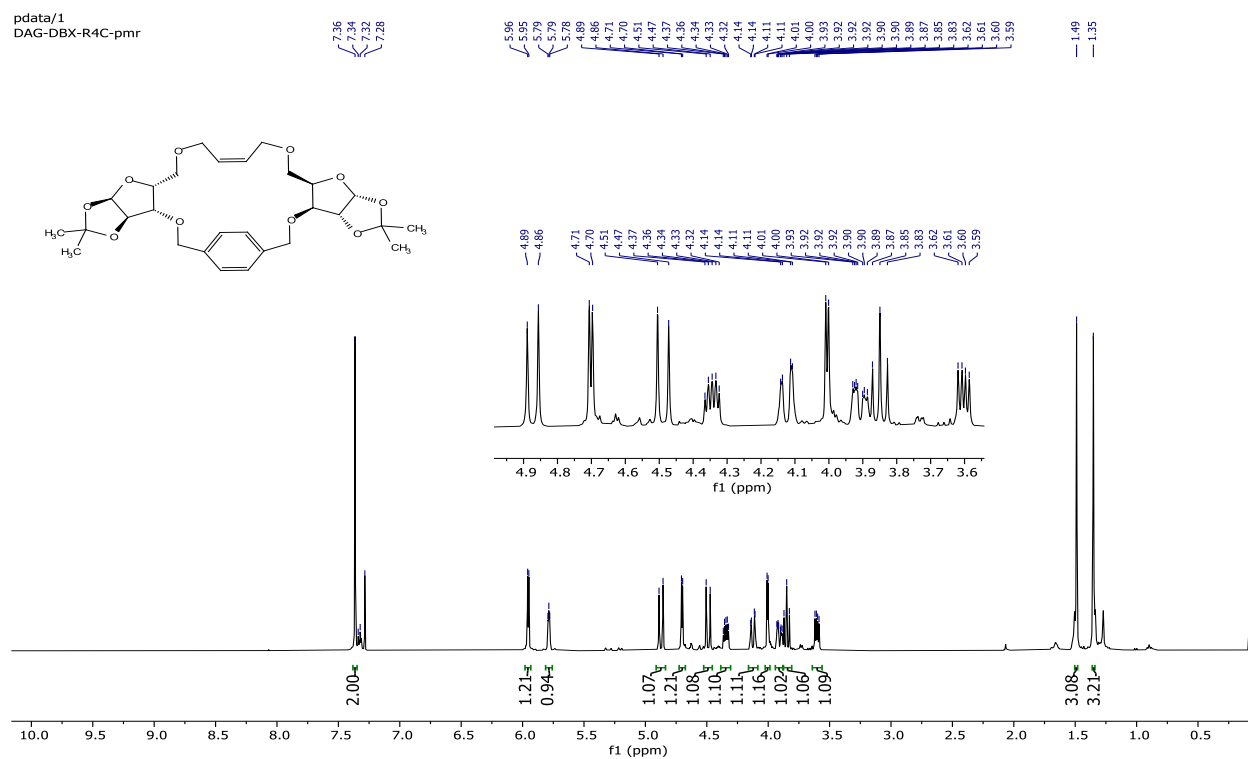


^{13}C NMR (100 MHz, Chloroform-*d*) of compound **CSM-3**

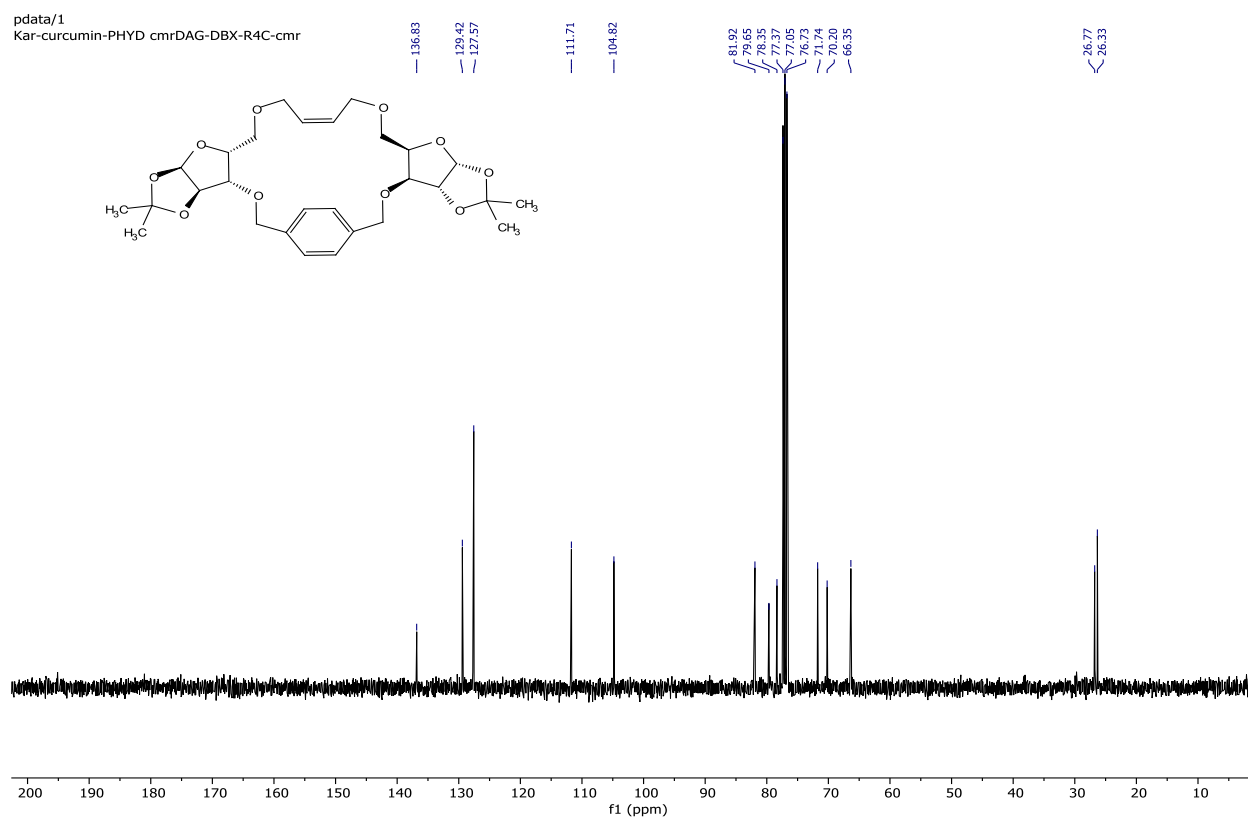


TOF-MS (US+) of compound CSM-3. (m/z: [M + Na]⁺ Calculated for C₃₂H₄₀O₁₀ -607.2519; Found-607.2515)

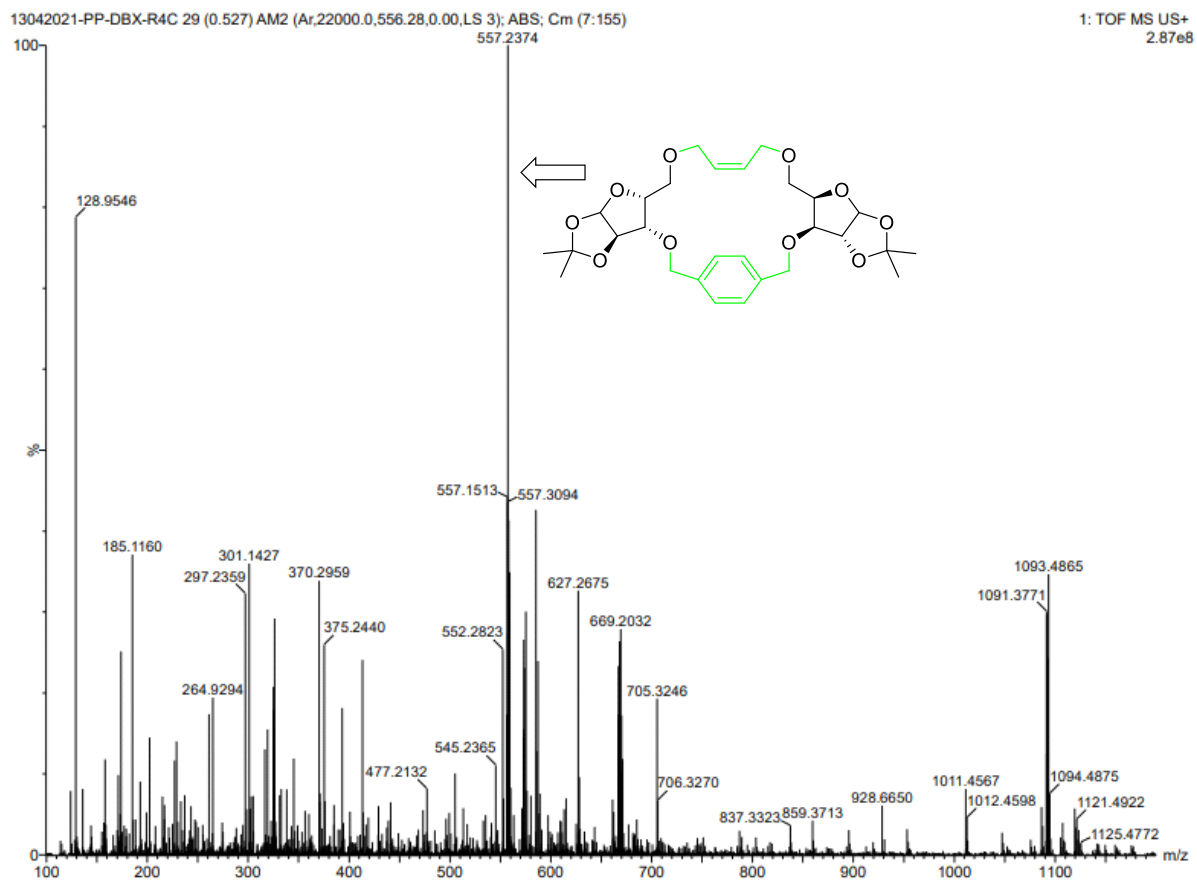
 ^1H NMR (400 MHz, CDCl_3) of compound **11** ^{13}C NMR (100 MHz, CDCl_3) of compound **11**



¹H NMR (400 MHz, Chloroform-*d*) of compound **CSM-4**



¹³C NMR (100 MHz, Chloroform-*d*) of compound **CSM-4**



TOF-MS (US+) of compound **CSM-4**. (m/z: [M + Na]⁺ Calculated for C₂₈H₃₈O₁₀ -557.2363; Found-557.2374)