

Synthesis, Solution and Solid State Properties of Homological Dialkylated Naphthalene Diimides. A Systematic Review of Molecules for Next-Generation Organic Electronics

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Kiersnowski^{1,2,*}

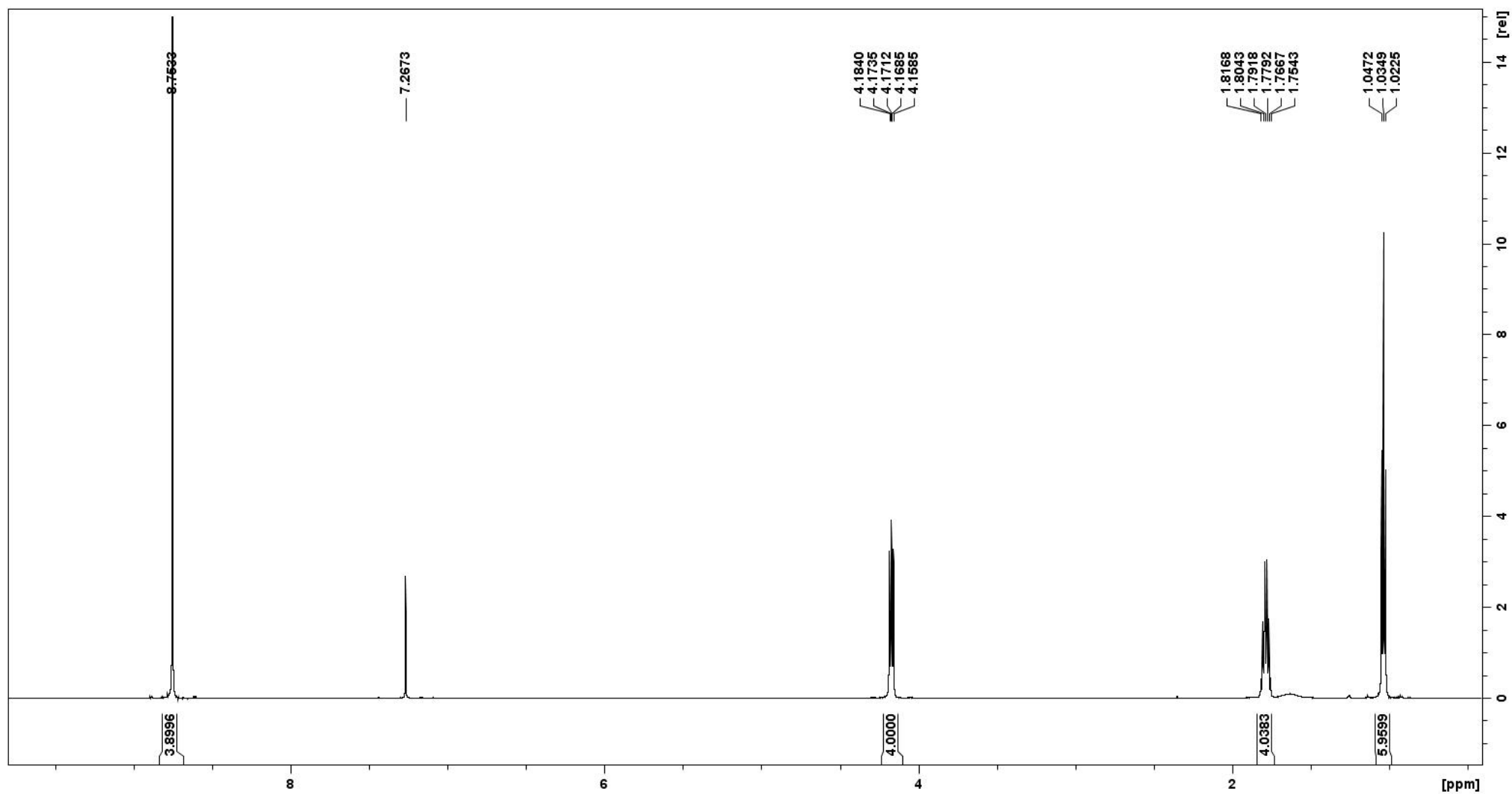
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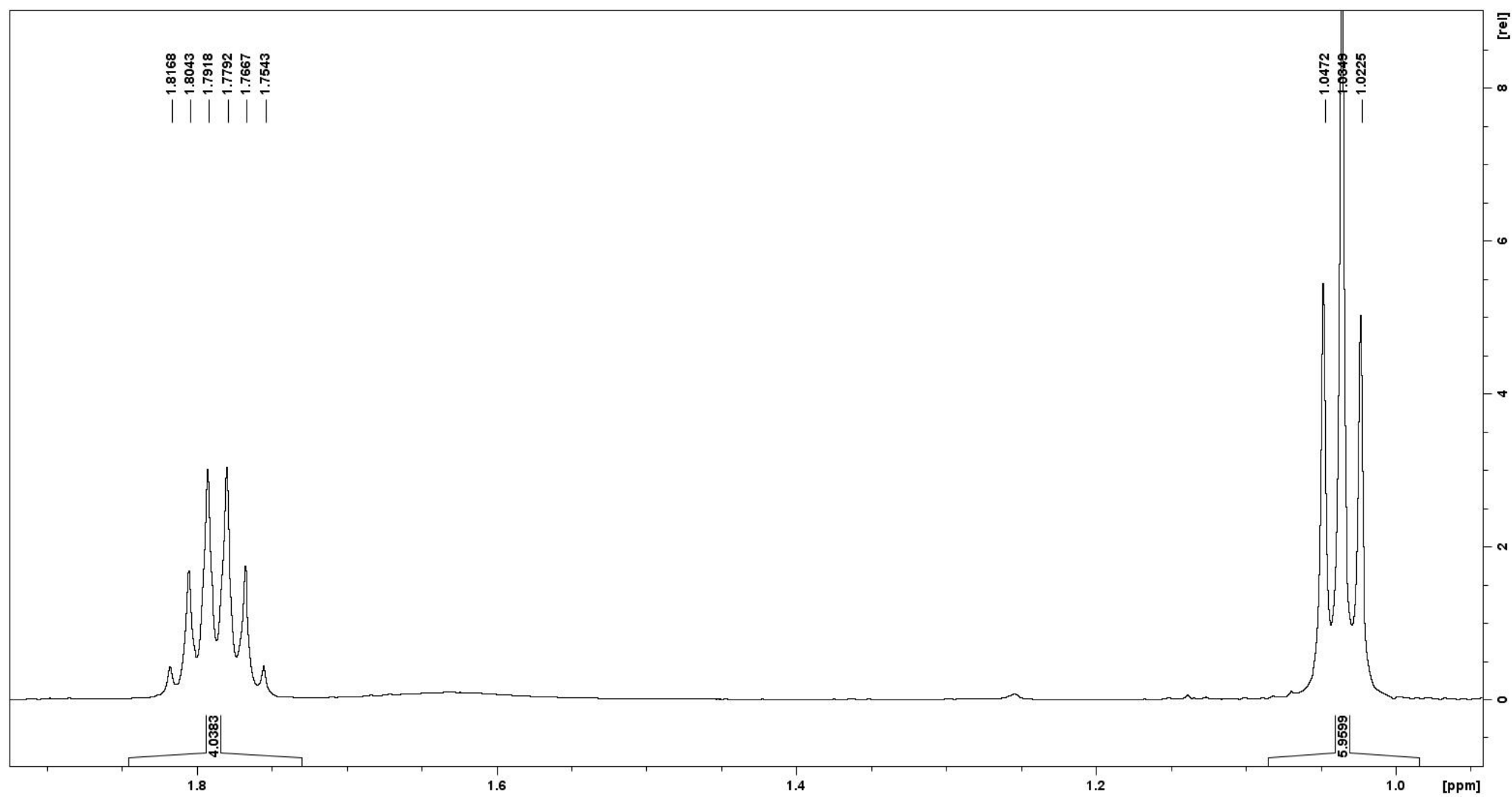
³ Department of Medicinal and Organic Chemistry, Wrocław University of Science and
Technology, Wybrzeże Wyspiańskiego 27, 50-370 Wrocław, Poland

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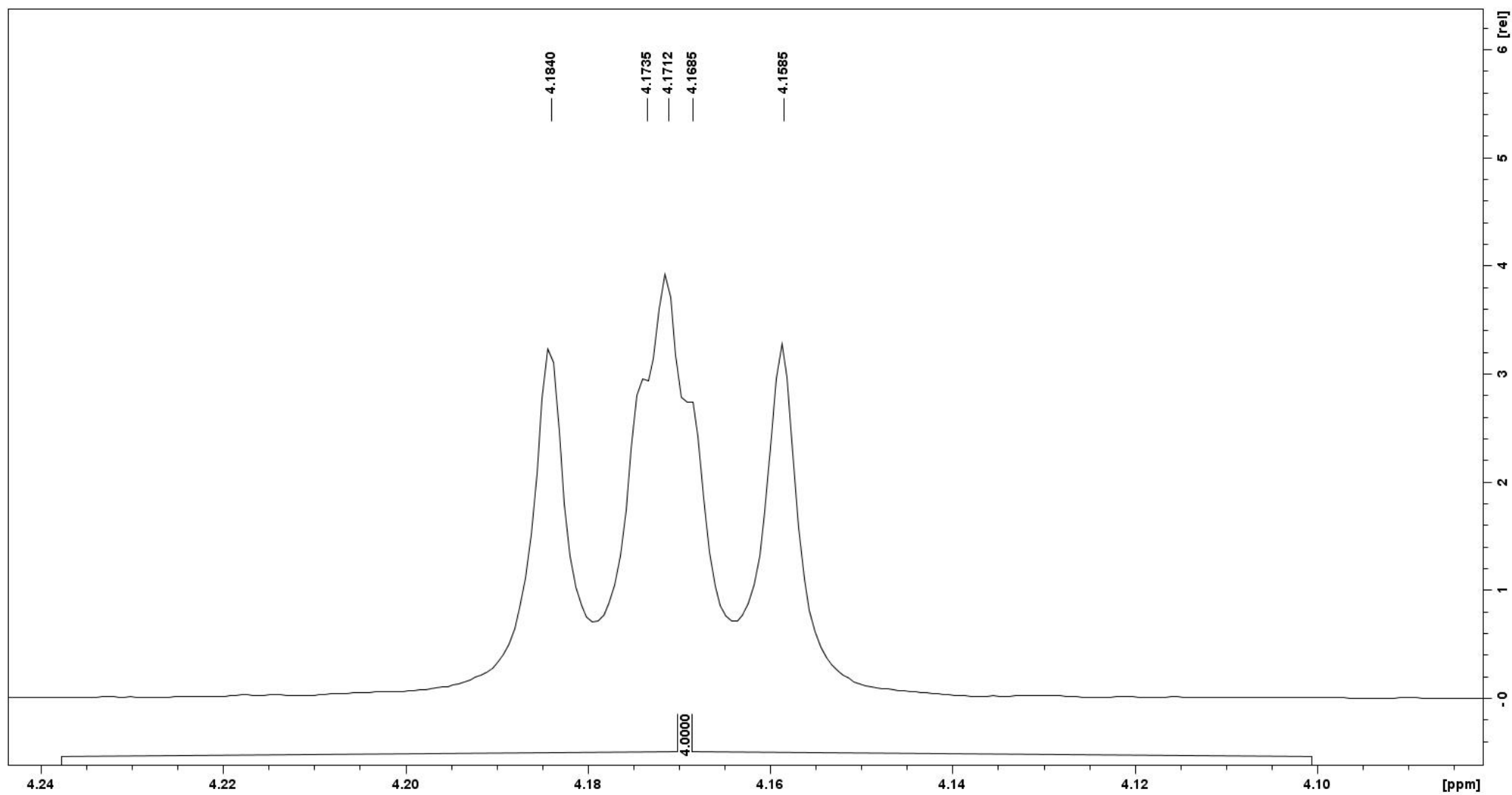
¹H and ¹³C NMR spectra of all NDIs



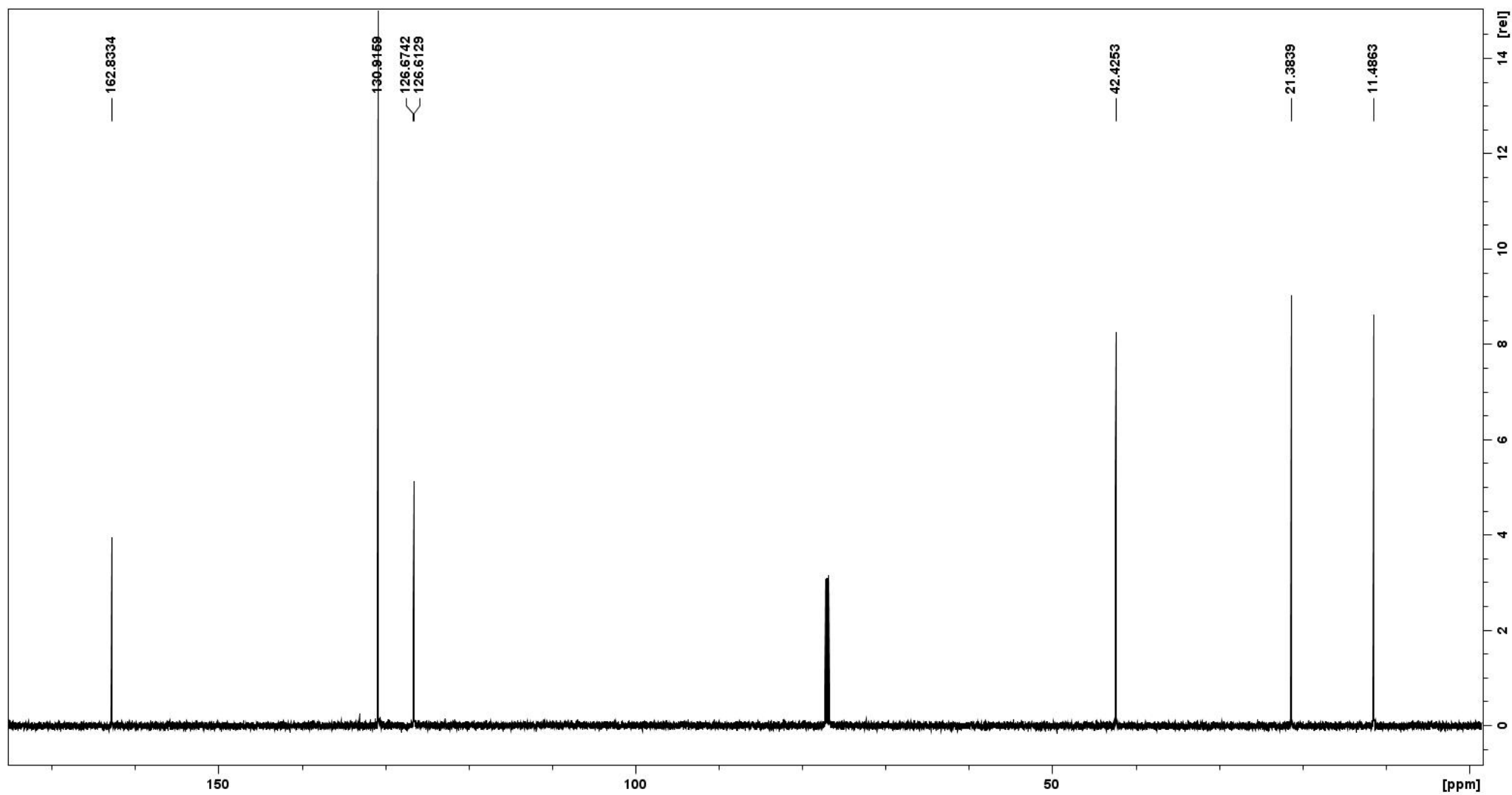
¹H NMR spectrum of NDIC3 (CDCl₃, 600MHz)



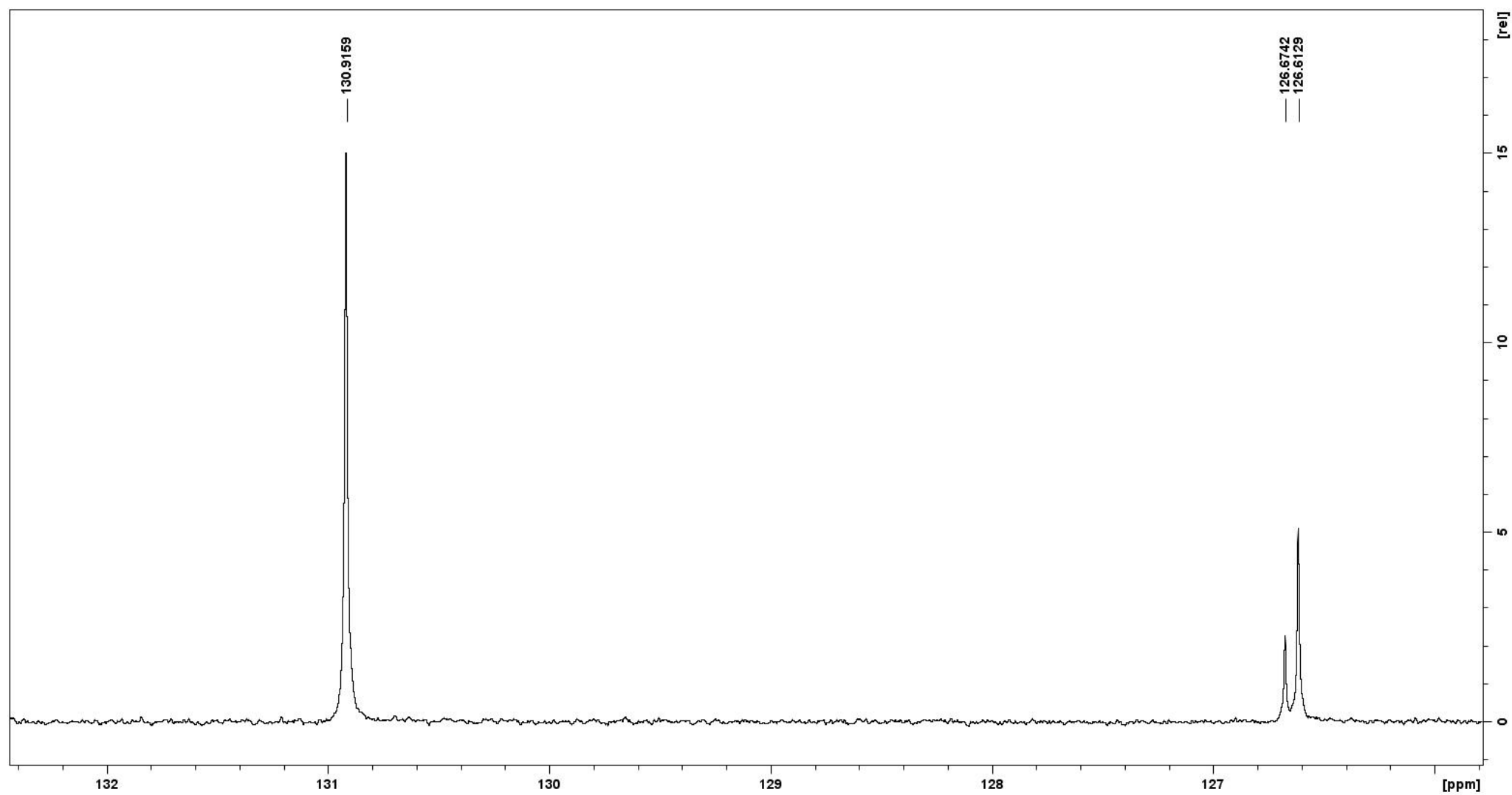
Expanded aliphatic region of ^1H NMR spectrum of NDIC3.



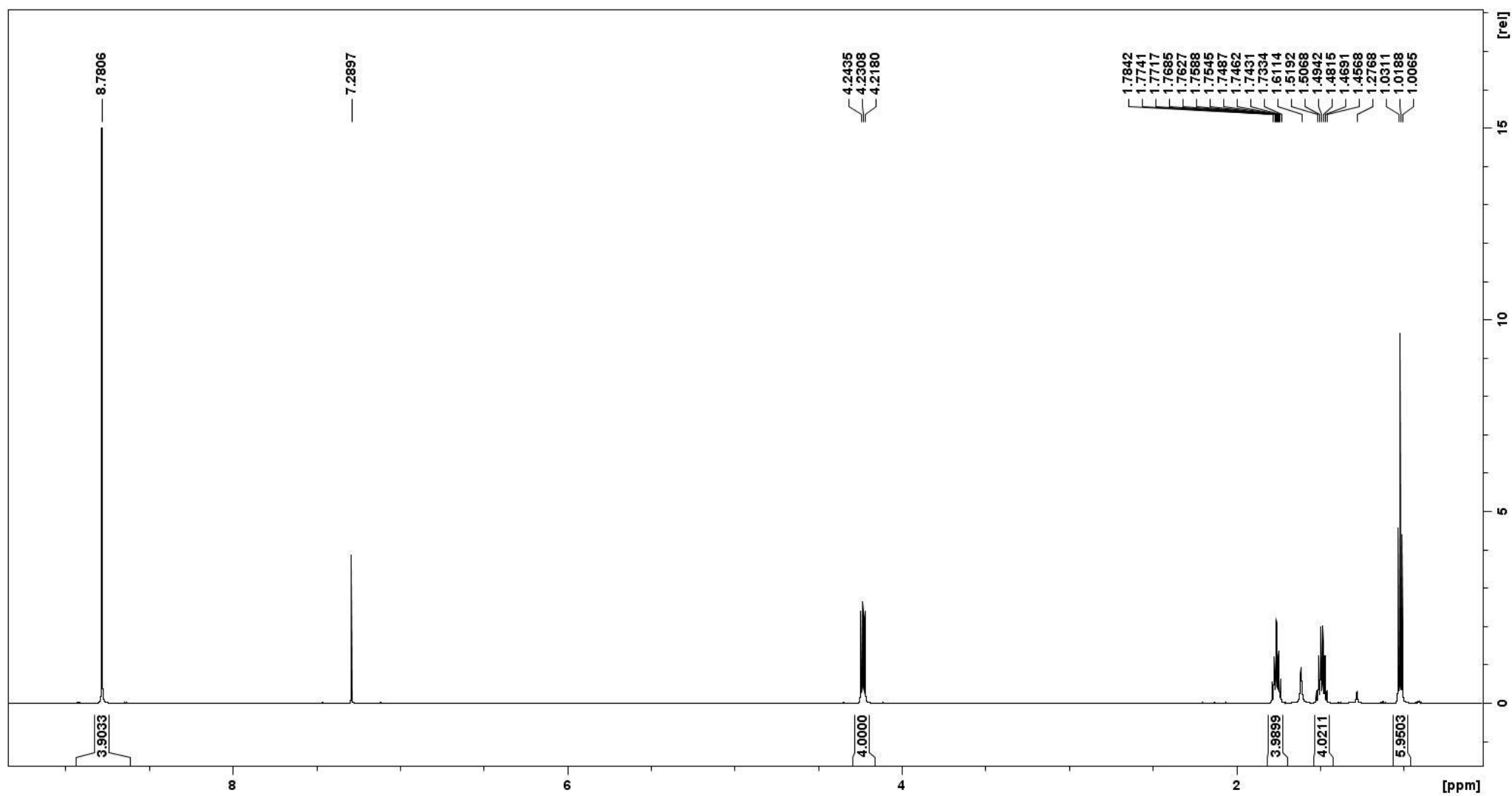
Expanded aliphatic region of ^1H NMR spectrum of NDIC3



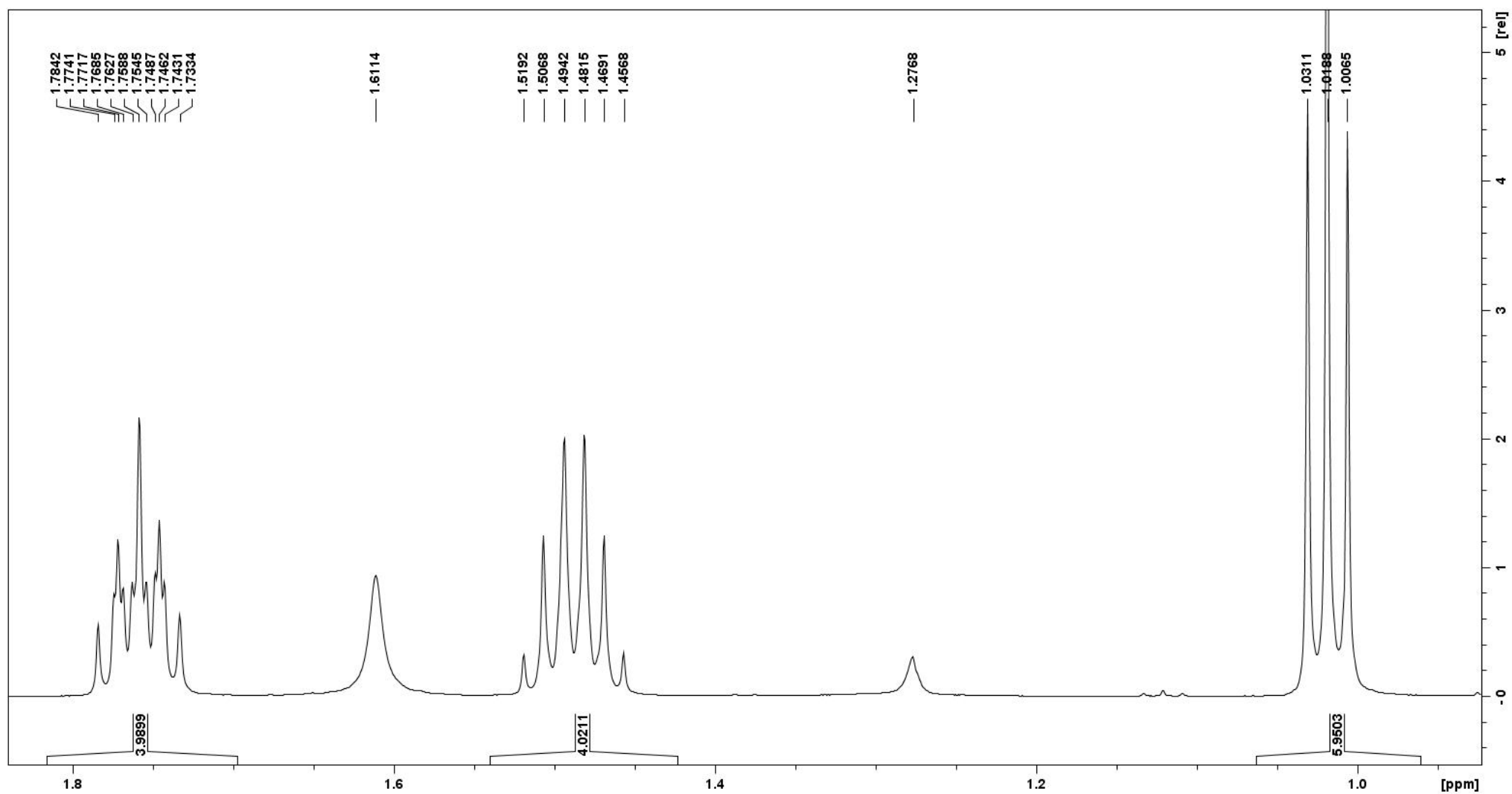
¹³C{¹H} NMR spectrum of NDIC3 (CDCl₃, 151MHz)



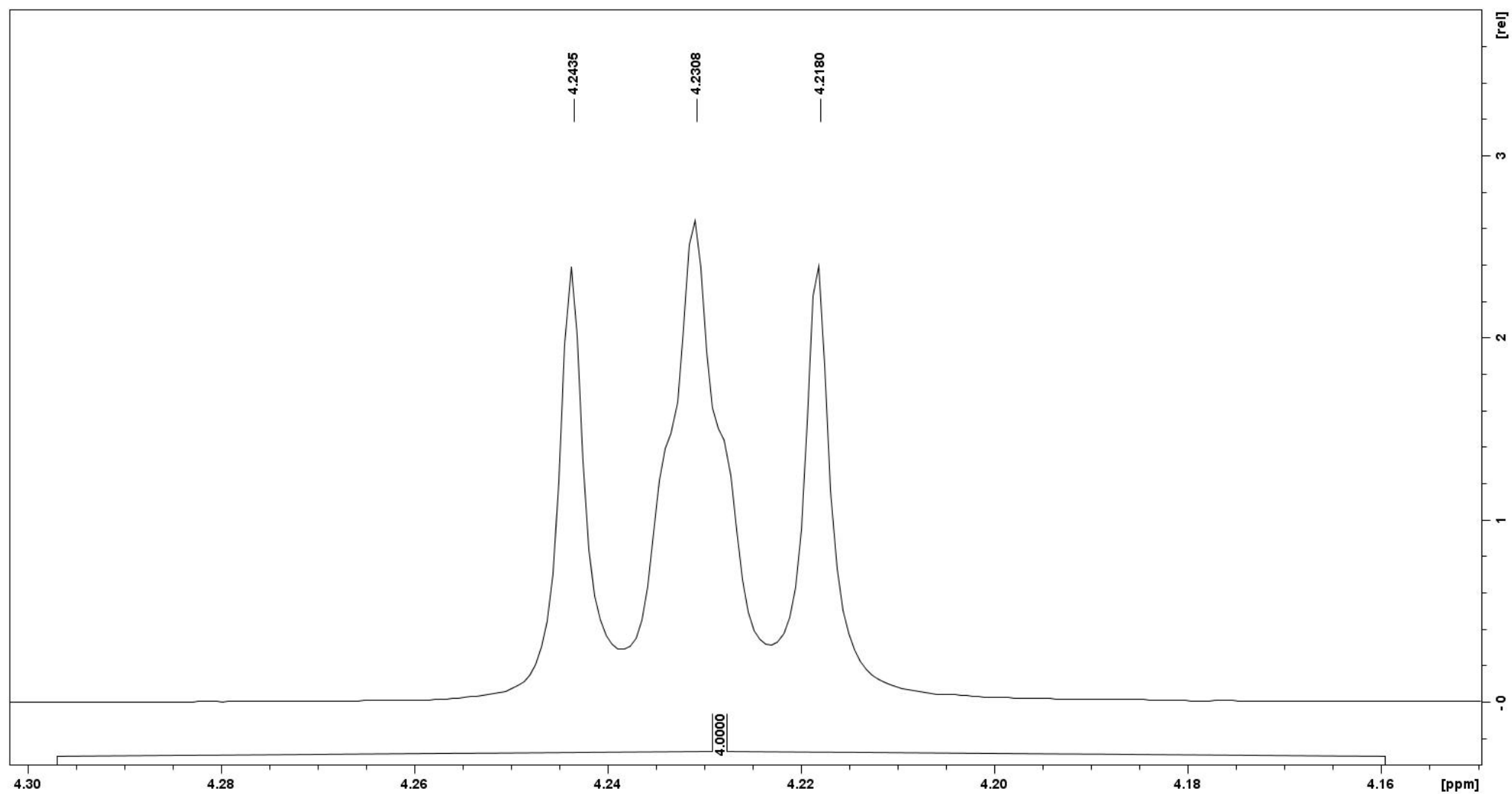
Expanded aromatic region of $^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC3



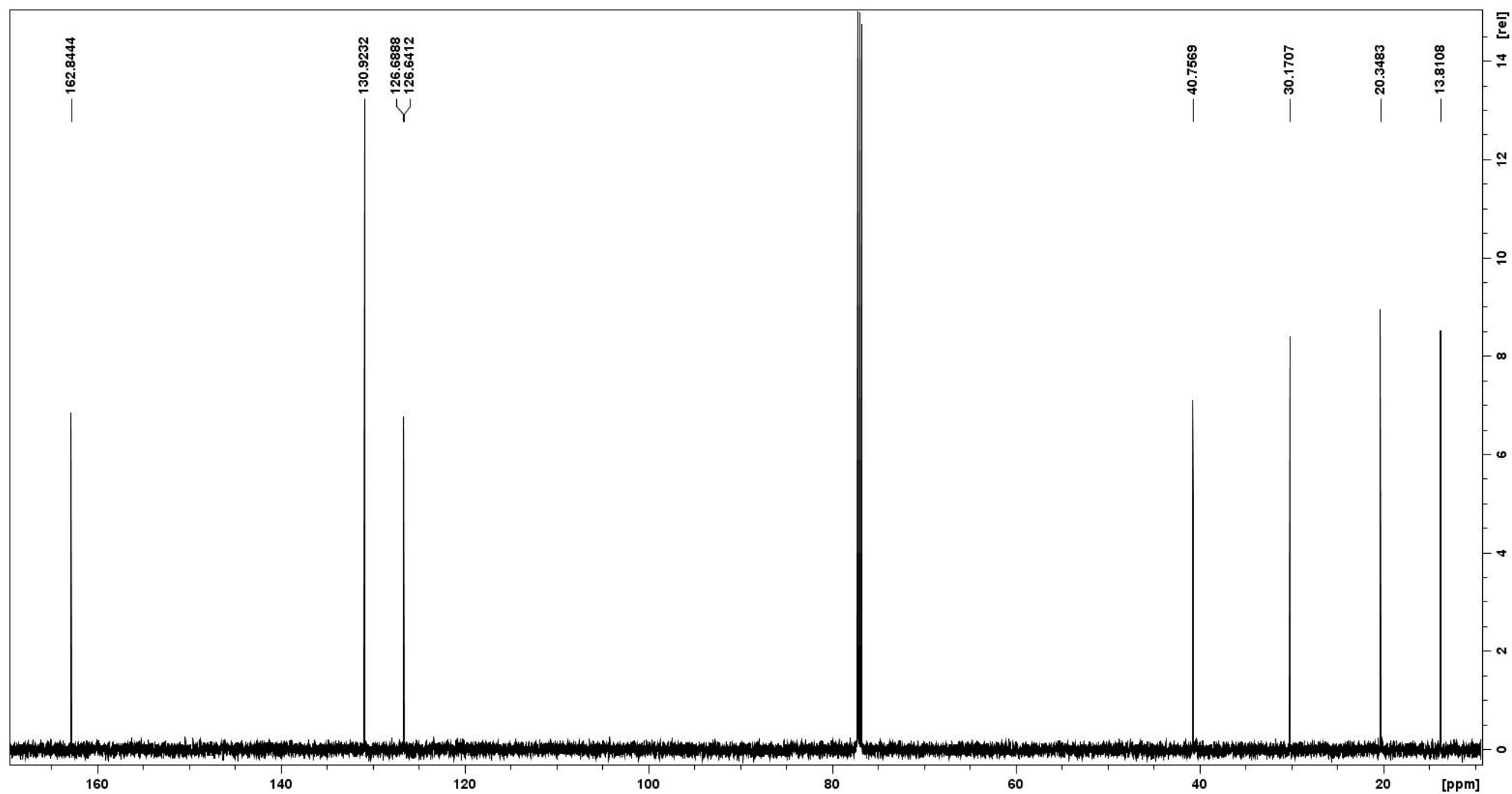
¹H NMR spectrum of NDIC4 (CDCl₃, 600MHz)



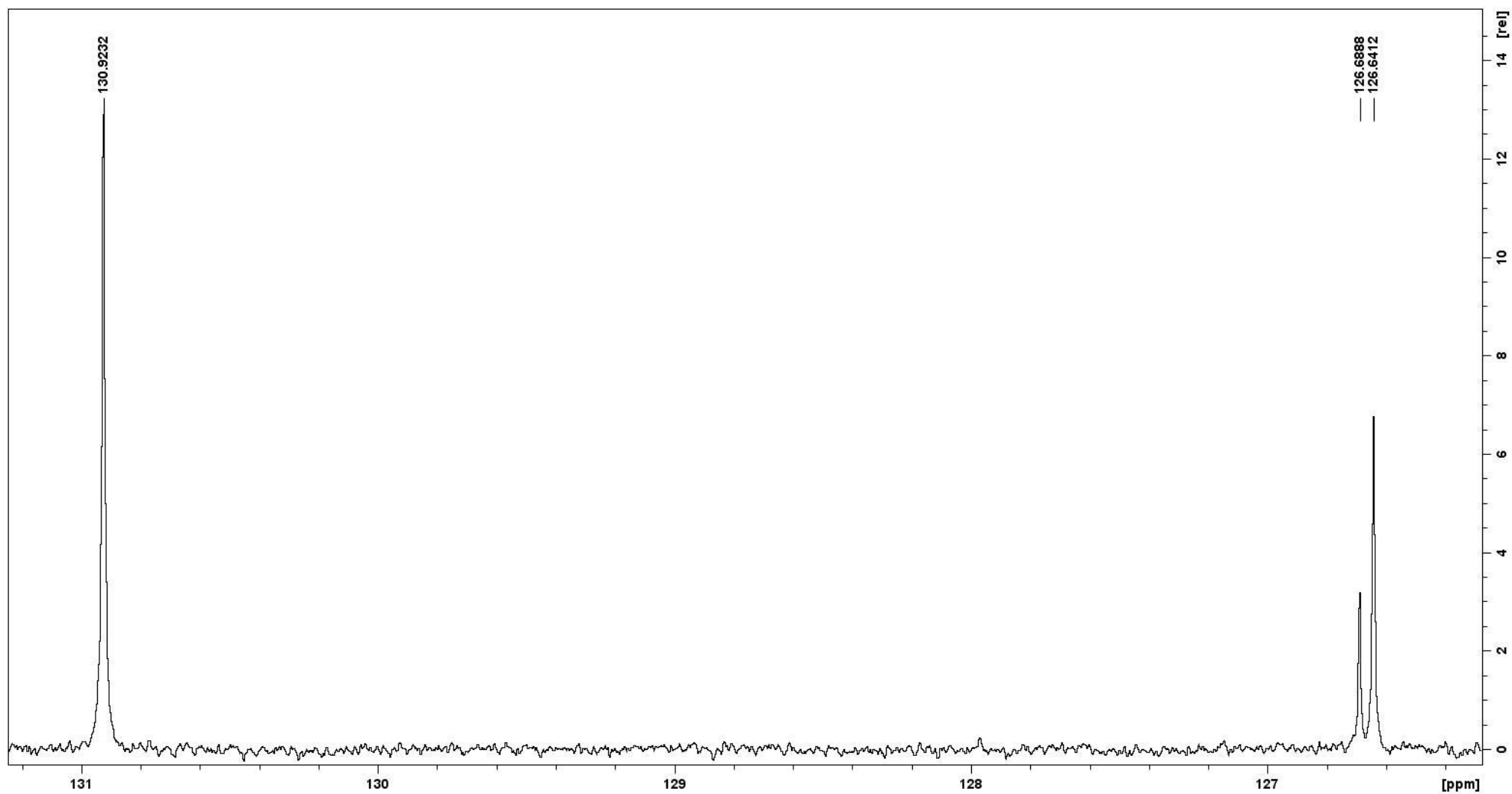
Expanded aliphatic region of ^1H NMR spectrum of NDIC4



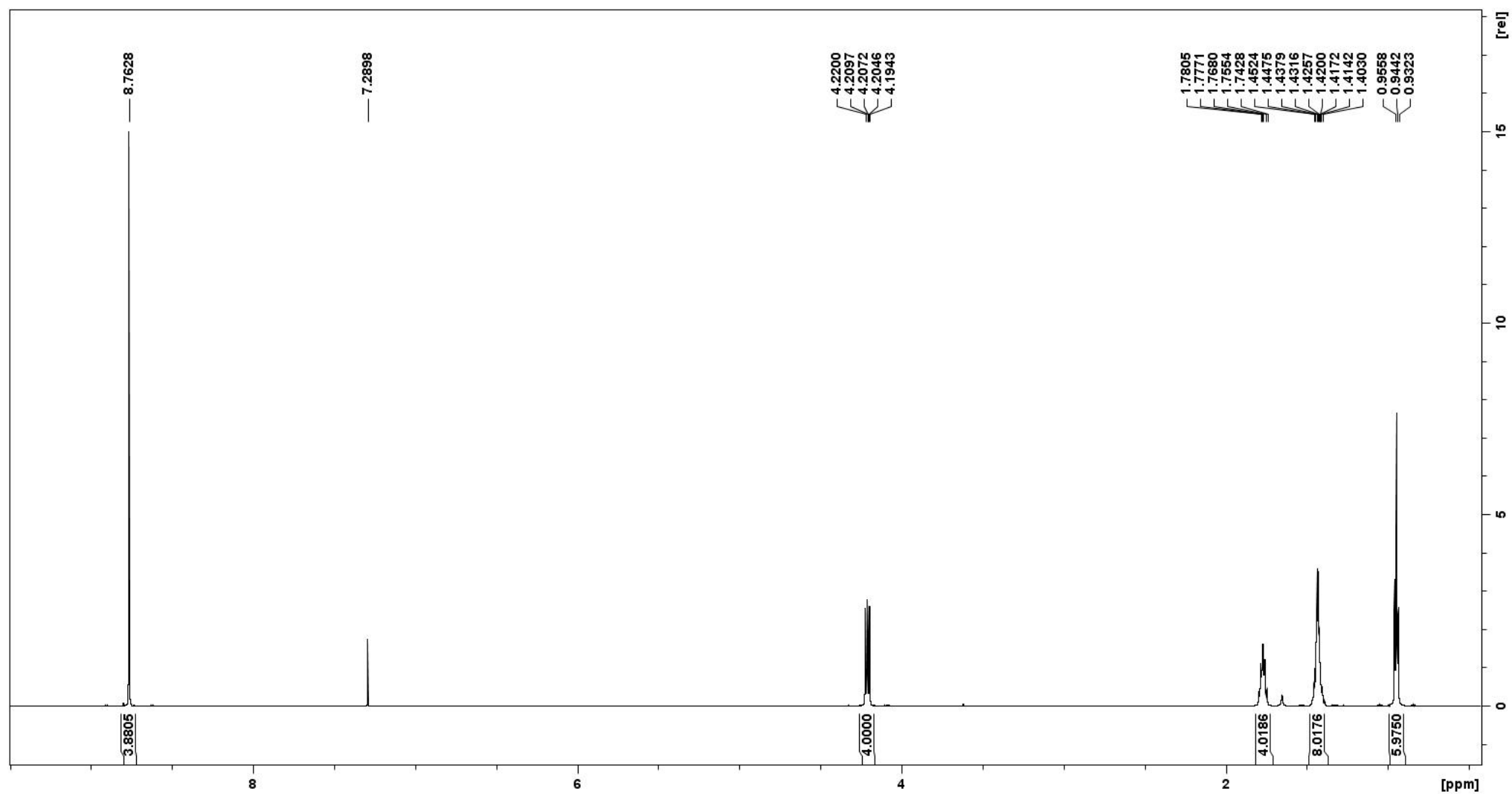
Expanded aliphatic region of ^1H NMR spectrum of NDIC4



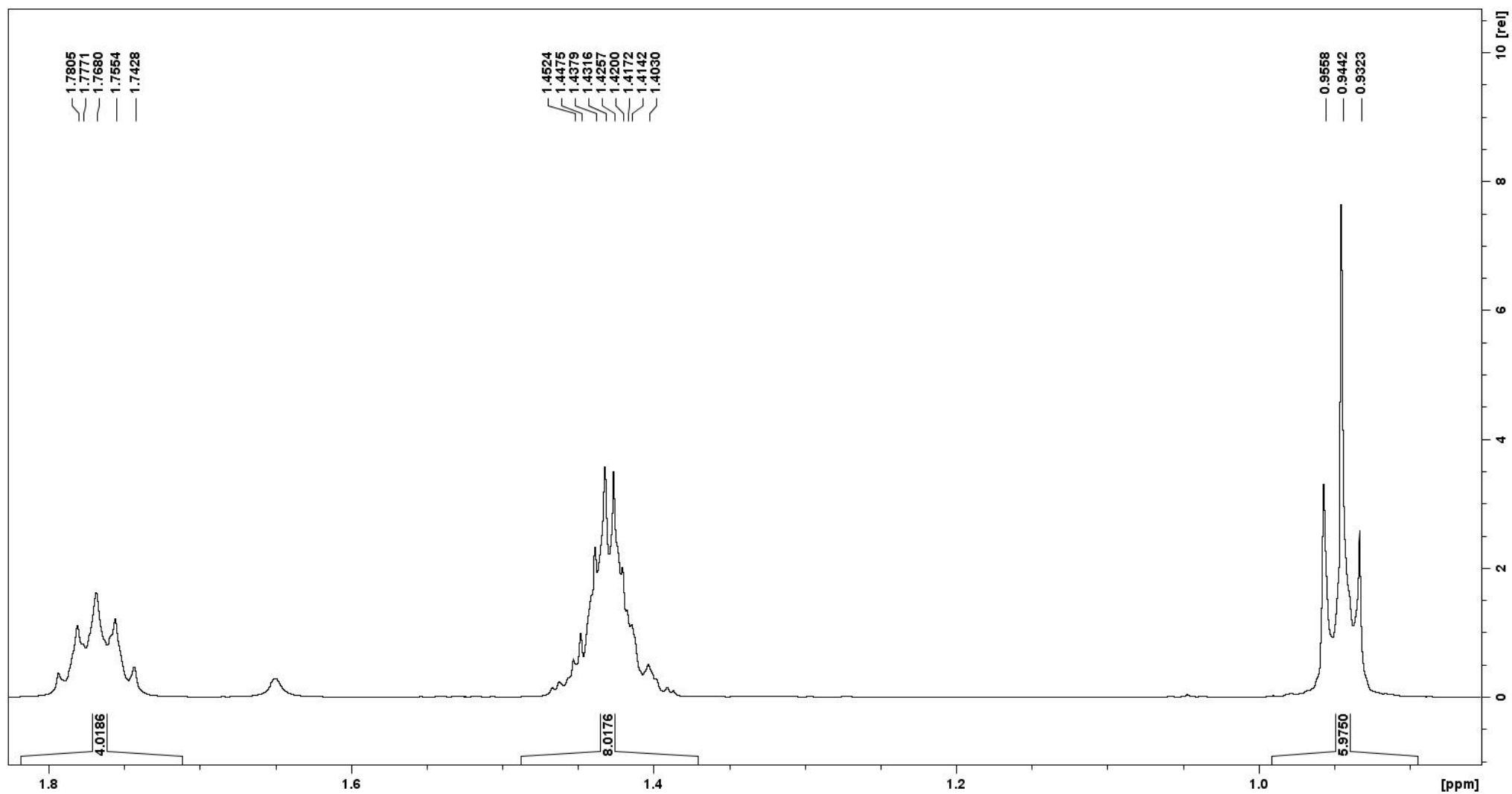
$^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC4 (CDCl_3 , 151 MHz)



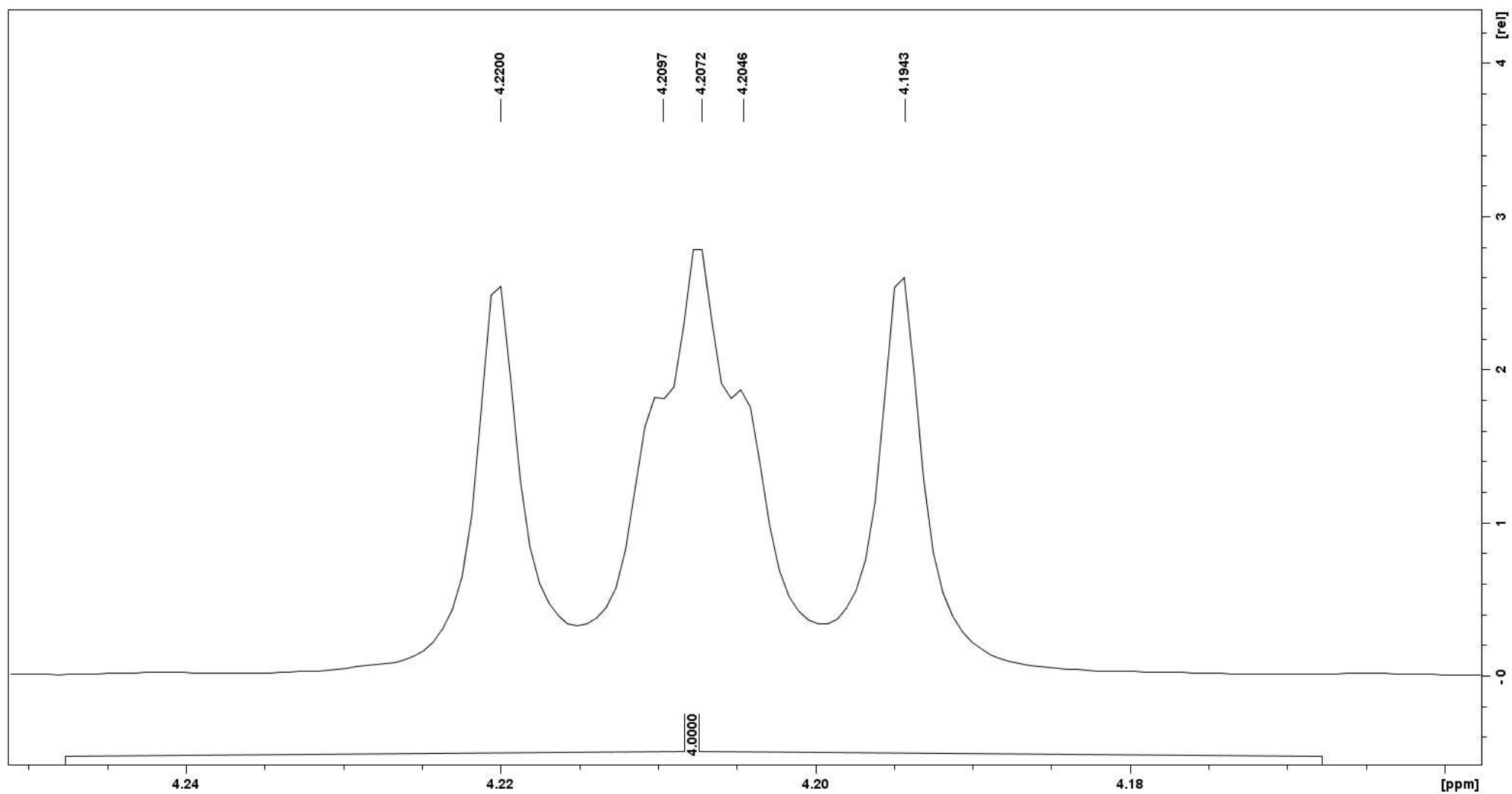
Expanded aromatic region of $^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC4



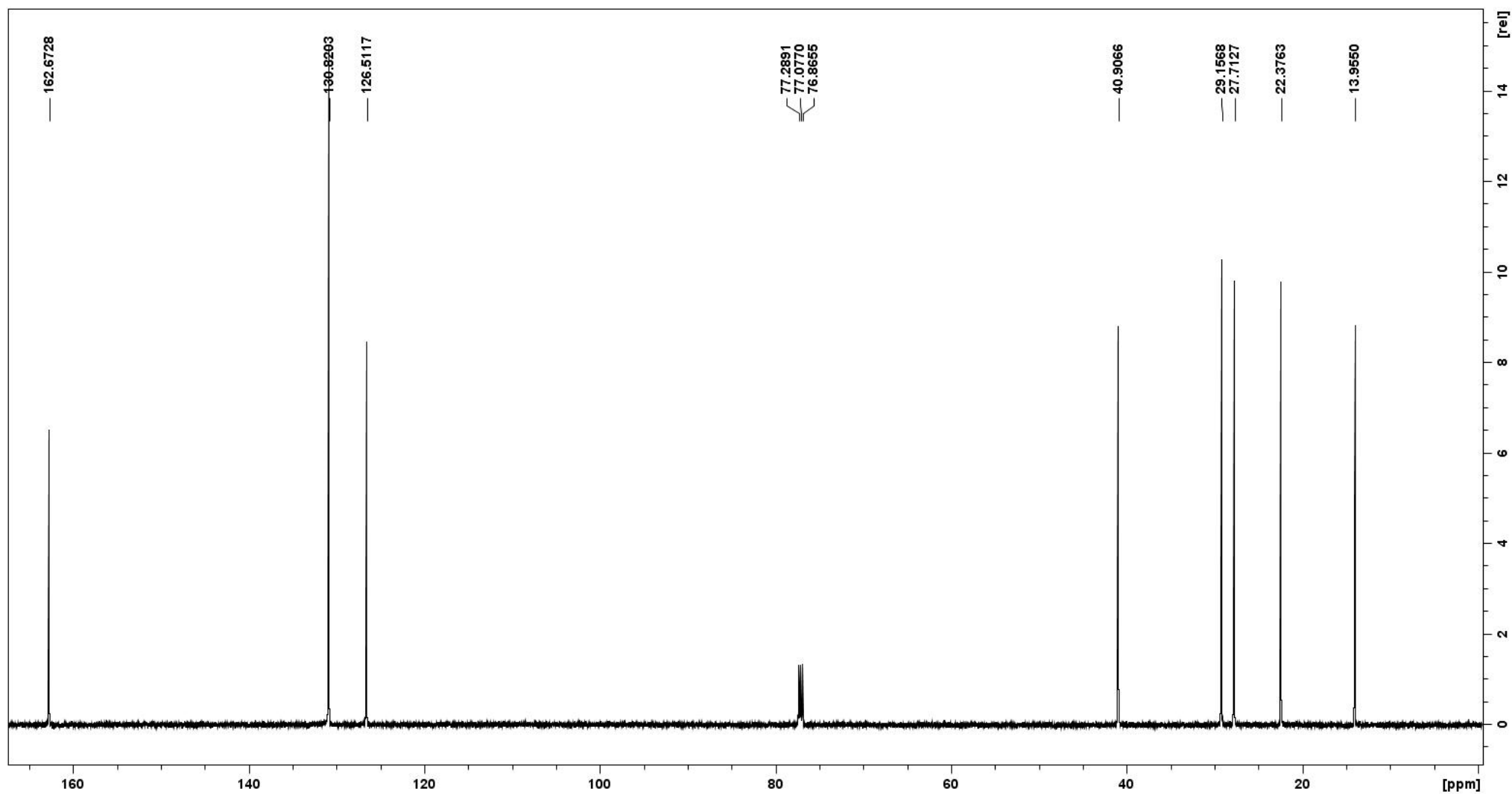
¹H NMR spectrum of NDIC5 (CDCl₃, 600MHz)



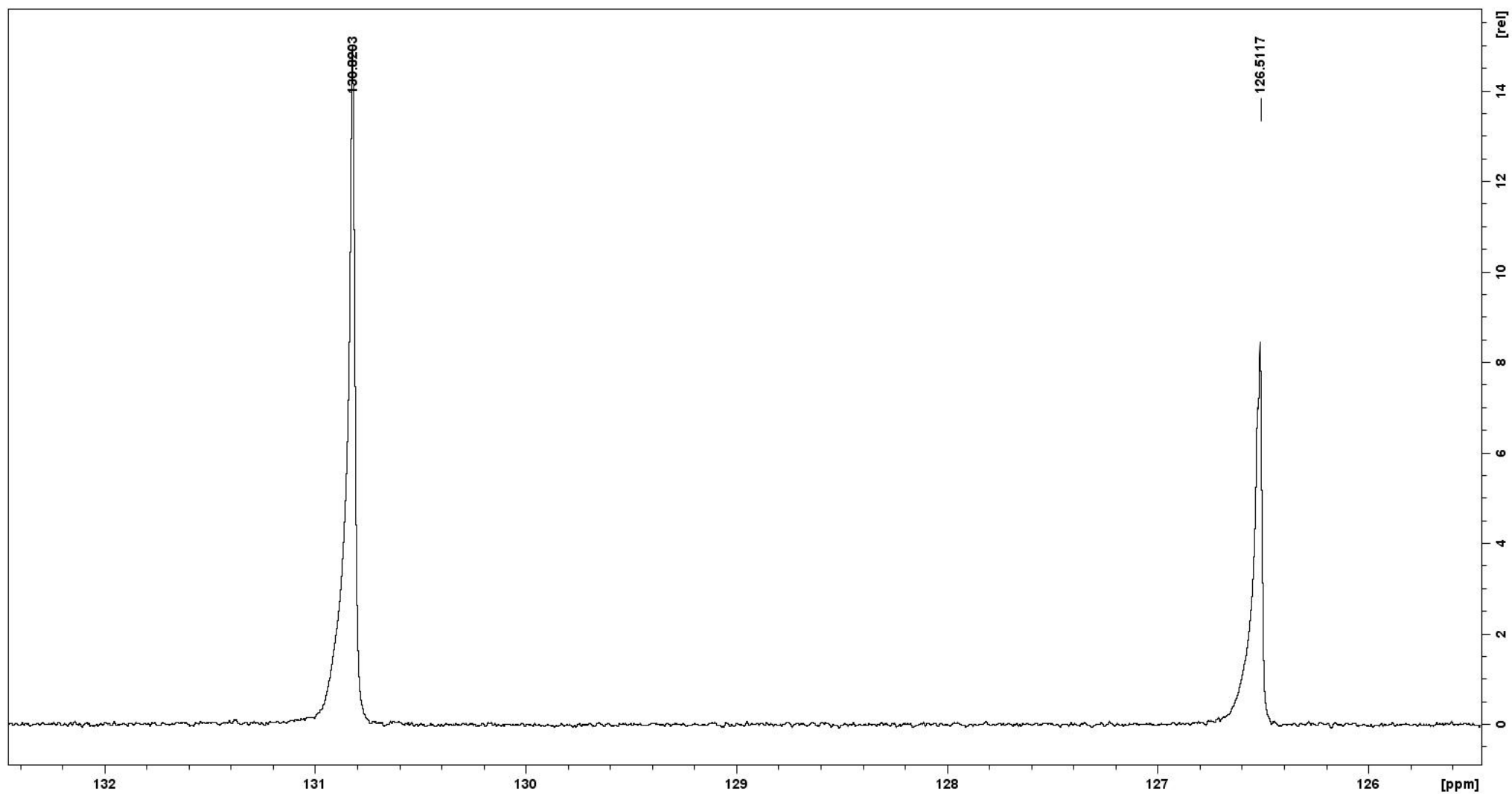
Expanded aliphatic region of ^1H NMR spectrum of NDIC5



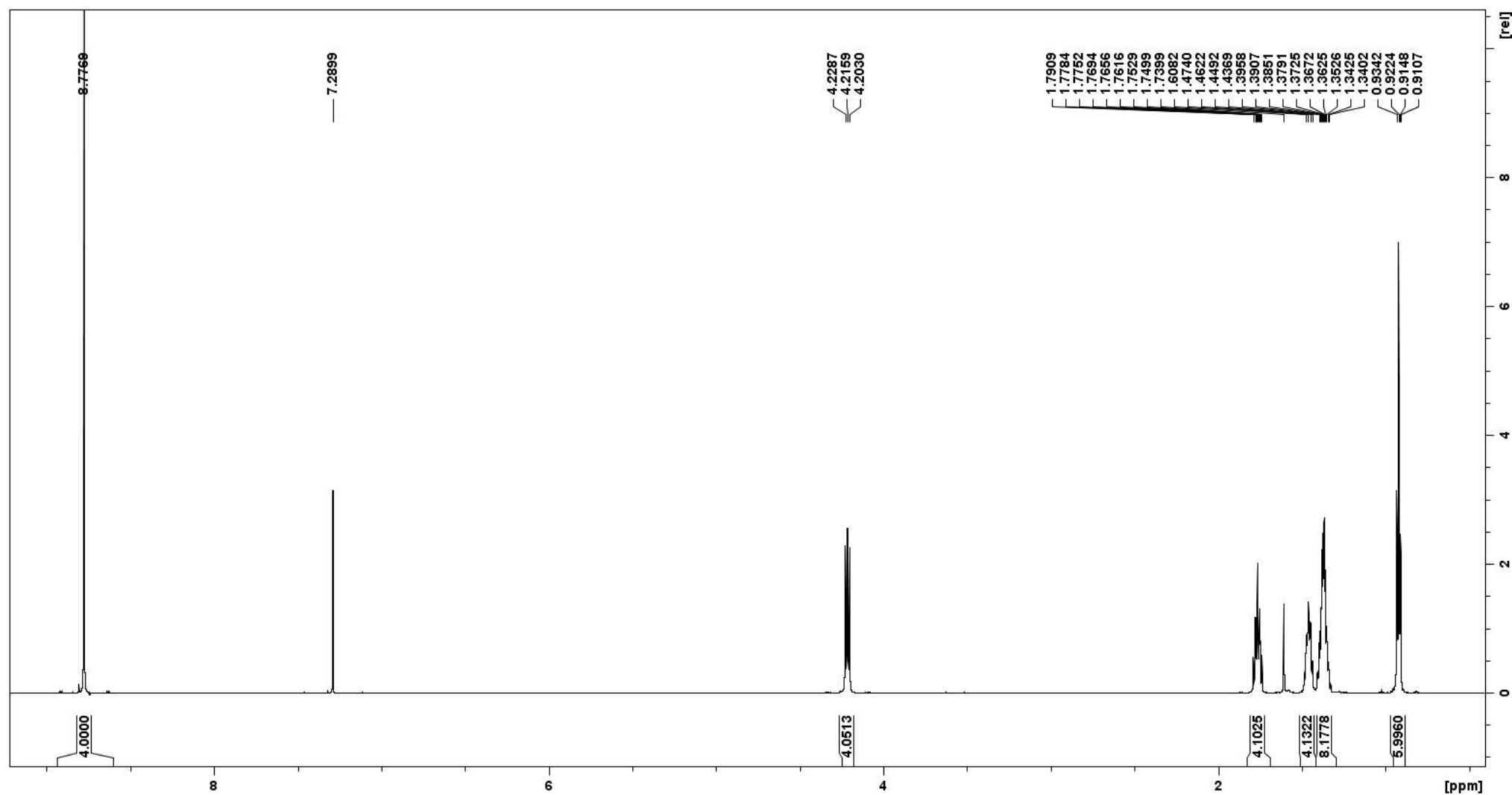
Expanded aliphatic region of ^1H NMR spectrum of NDIC5



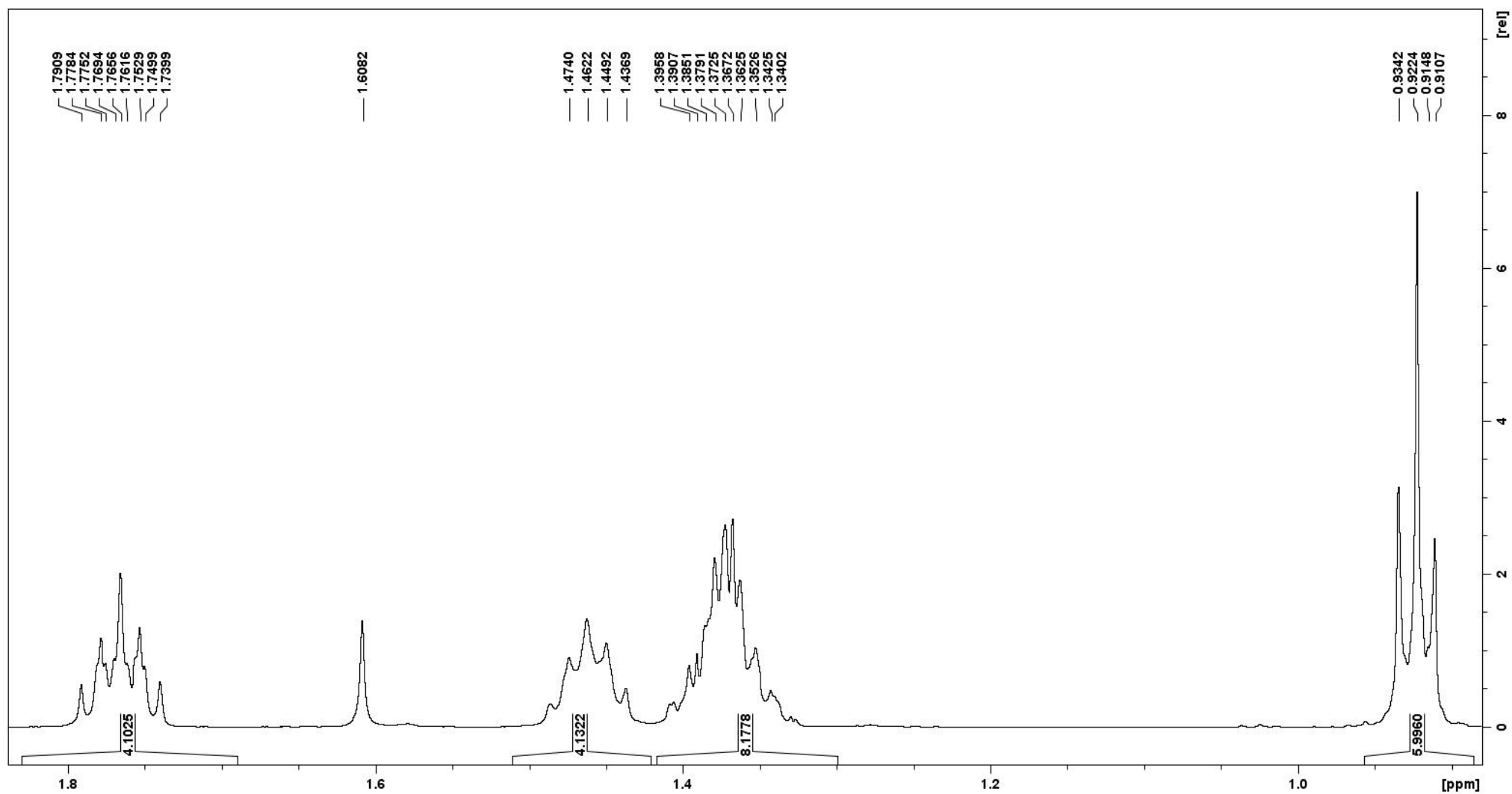
$^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC5 (CDCl_3 , 151 MHz)



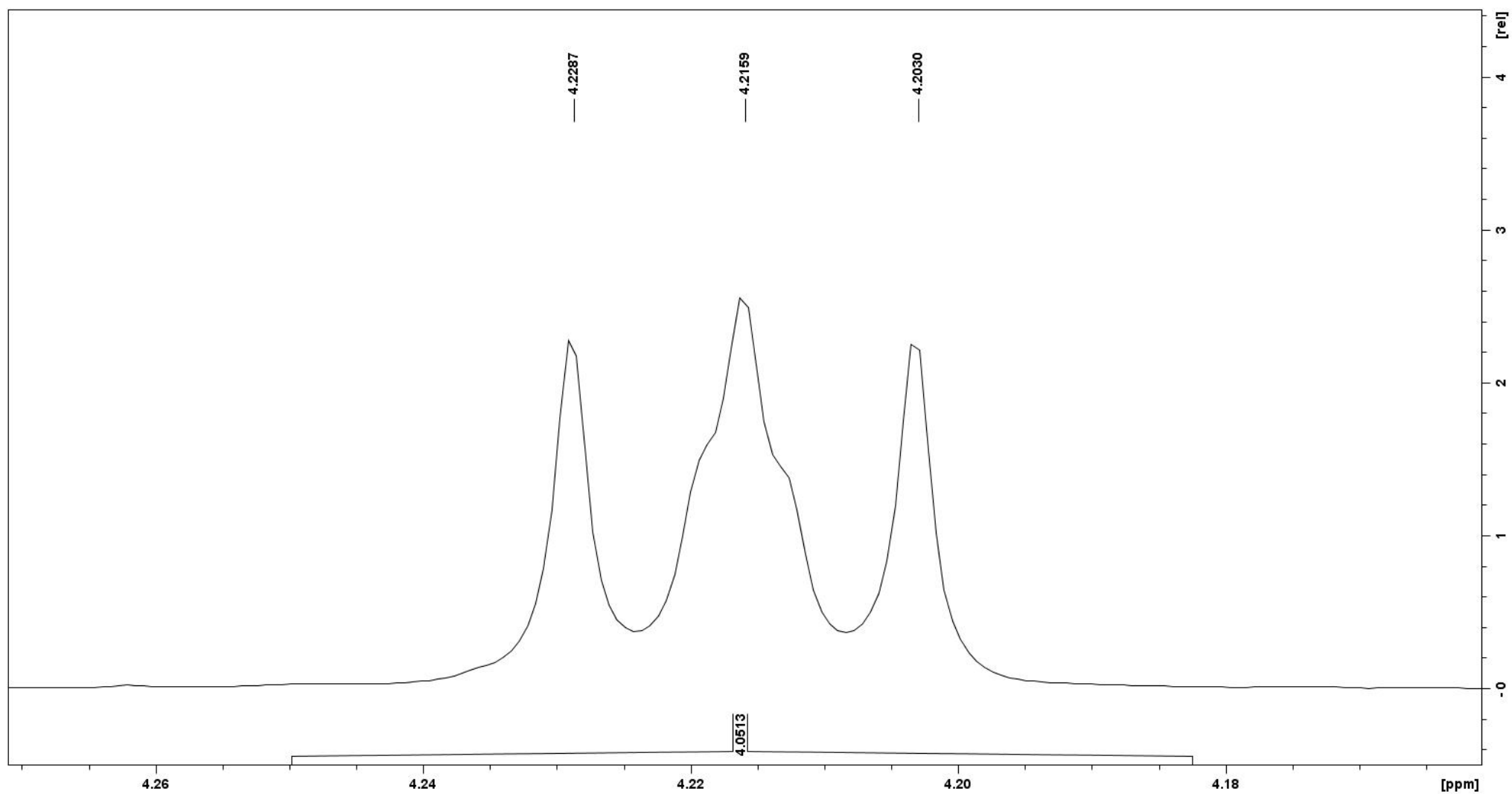
Expanded aromatic region of $^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC5



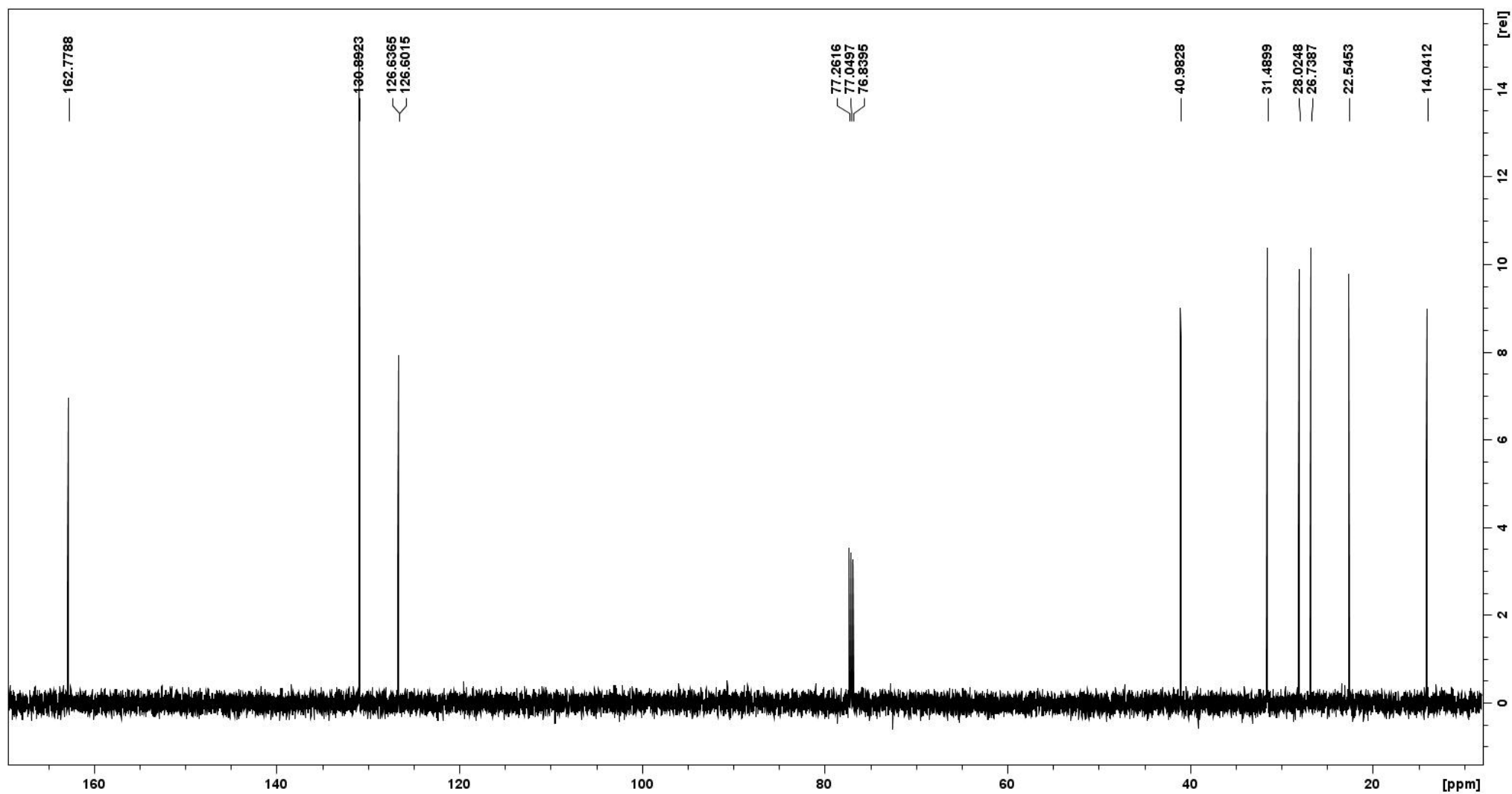
¹H NMR spectrum of NDIC6 (CDCl₃, 600MHz)



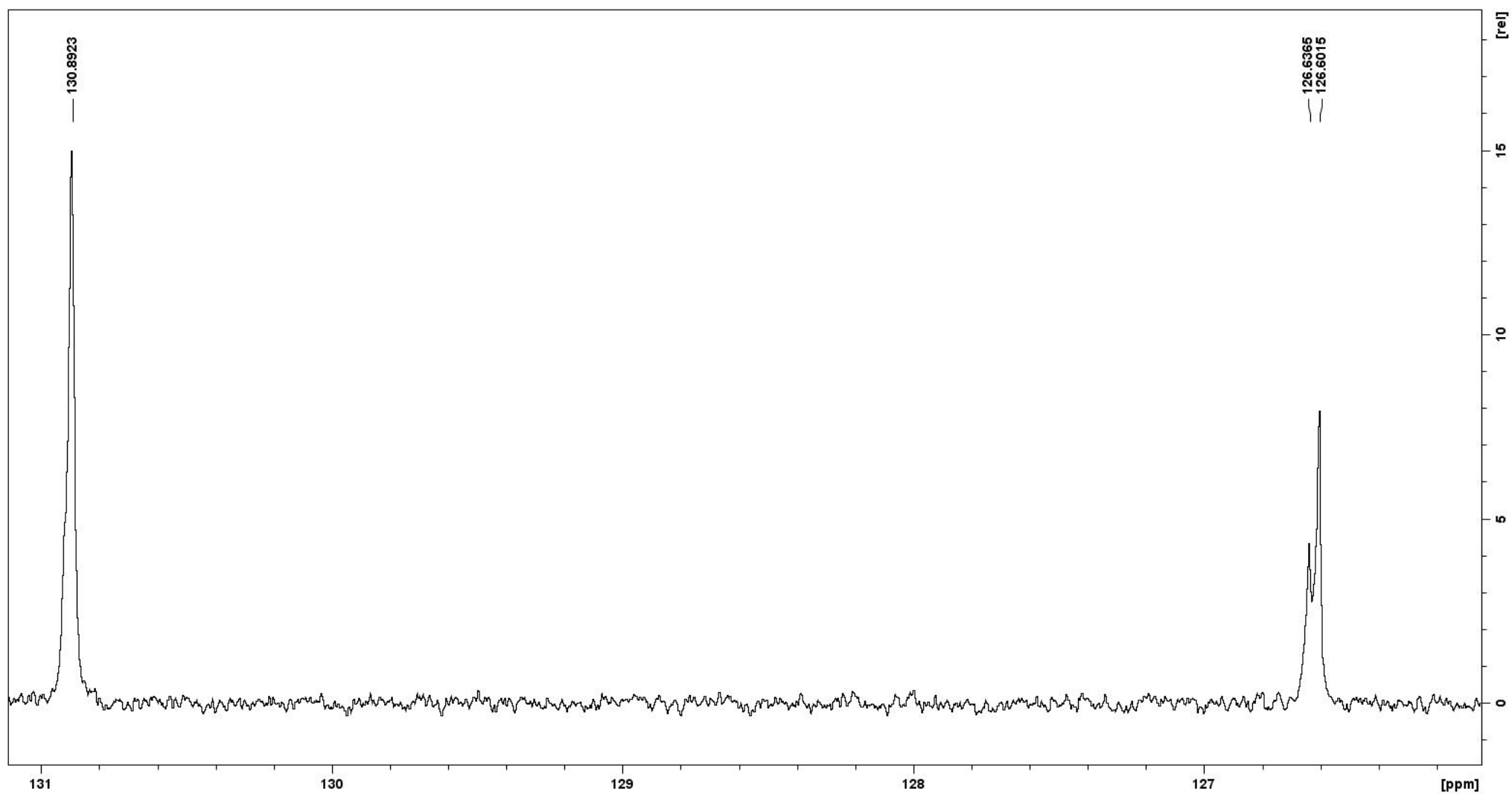
Expanded aliphatic region of ^1H NMR spectrum of NDIC6



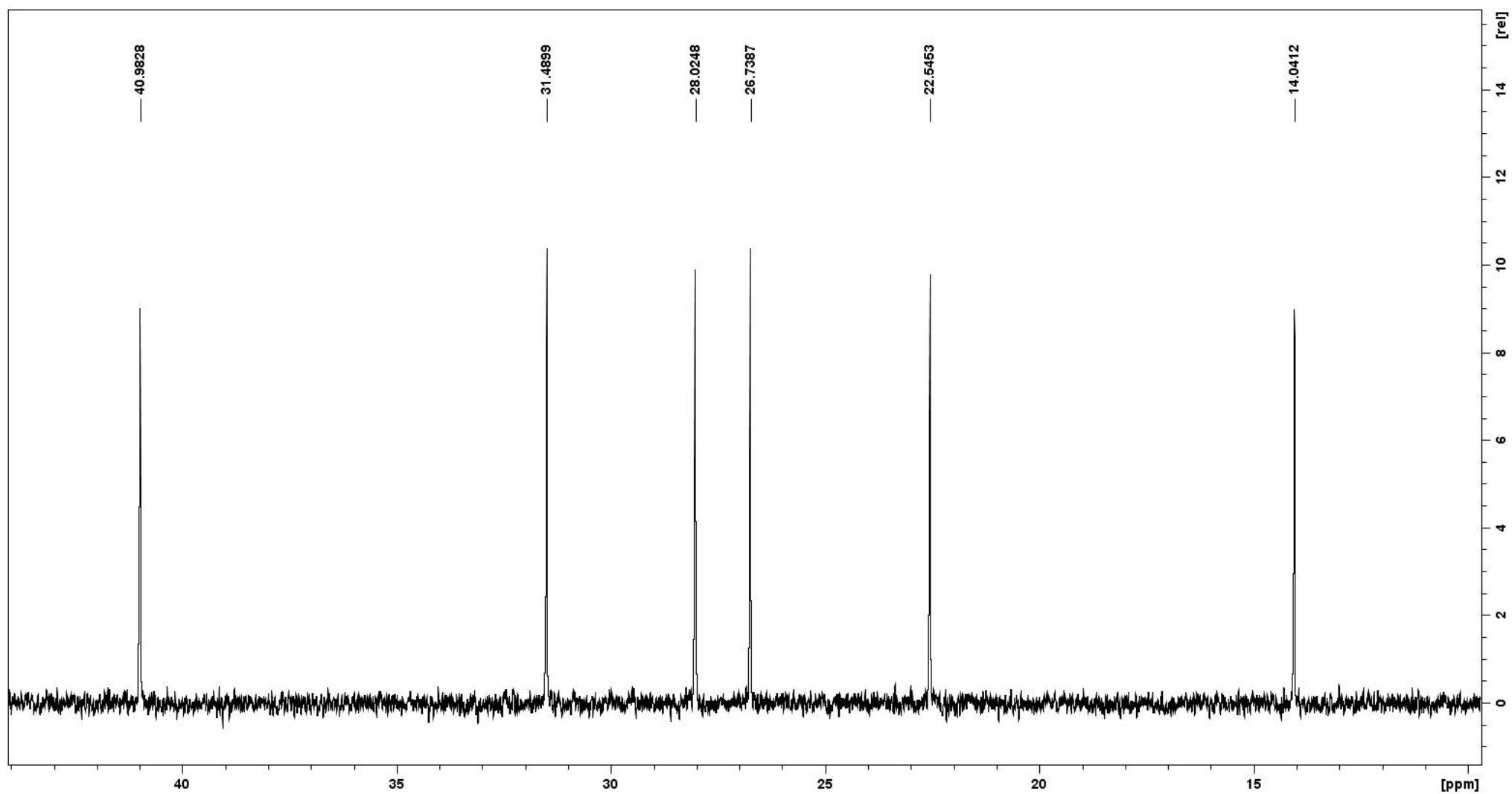
Expanded aliphatic region of ^1H NMR spectrum of NDIC6



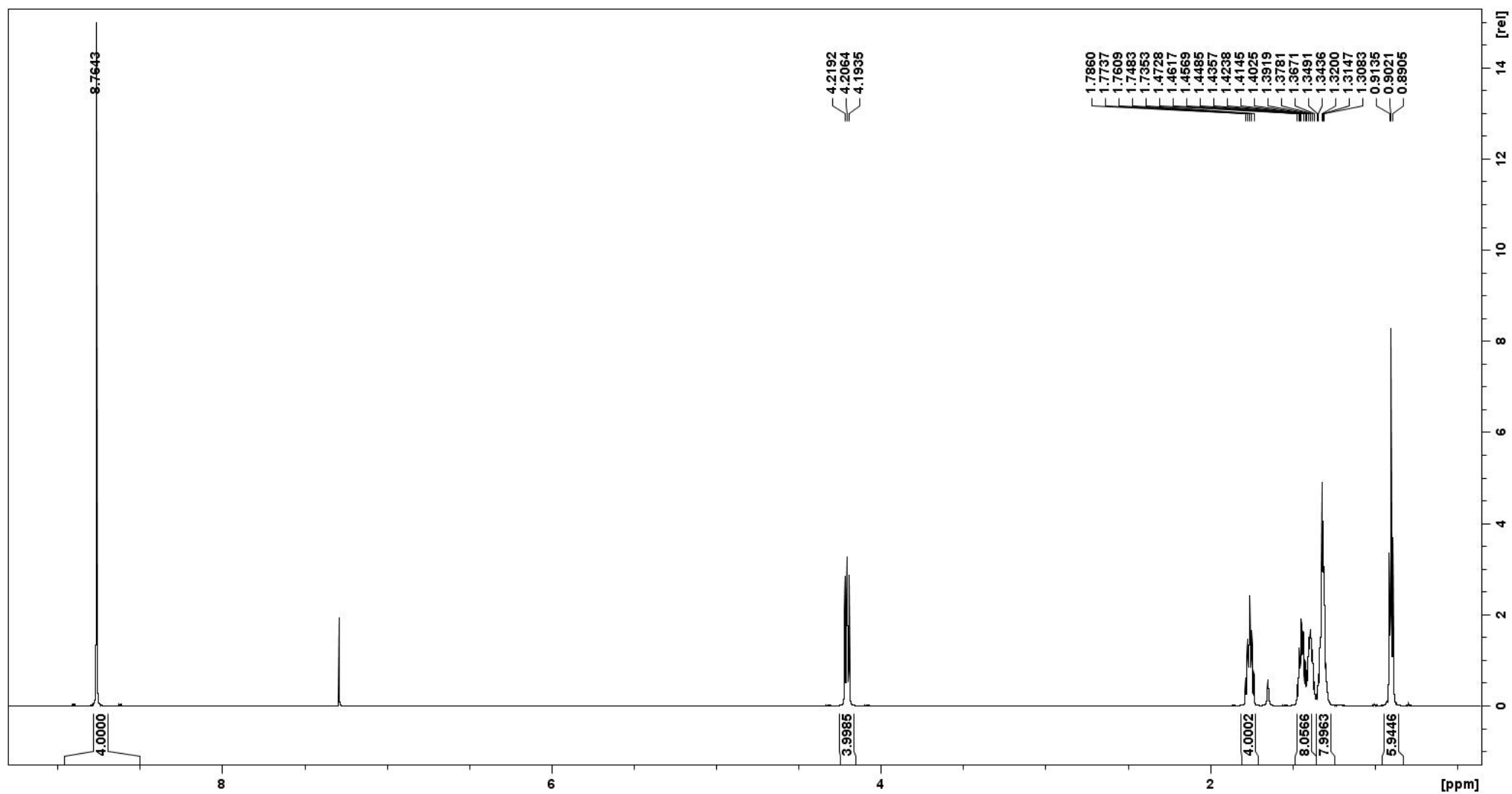
$^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC6 (CDCl_3 , 151MHz)



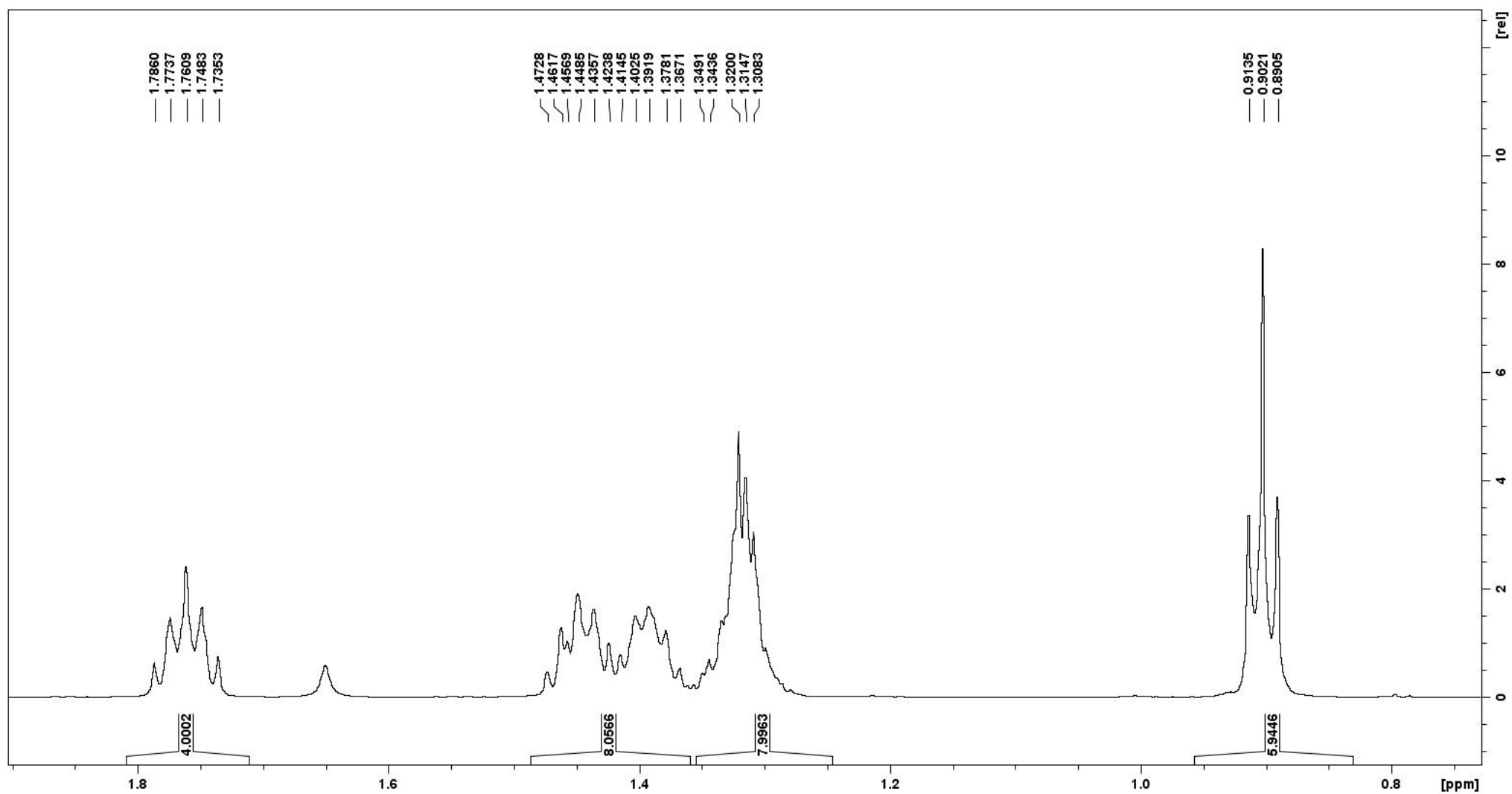
Expanded aromatic region of $^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC6



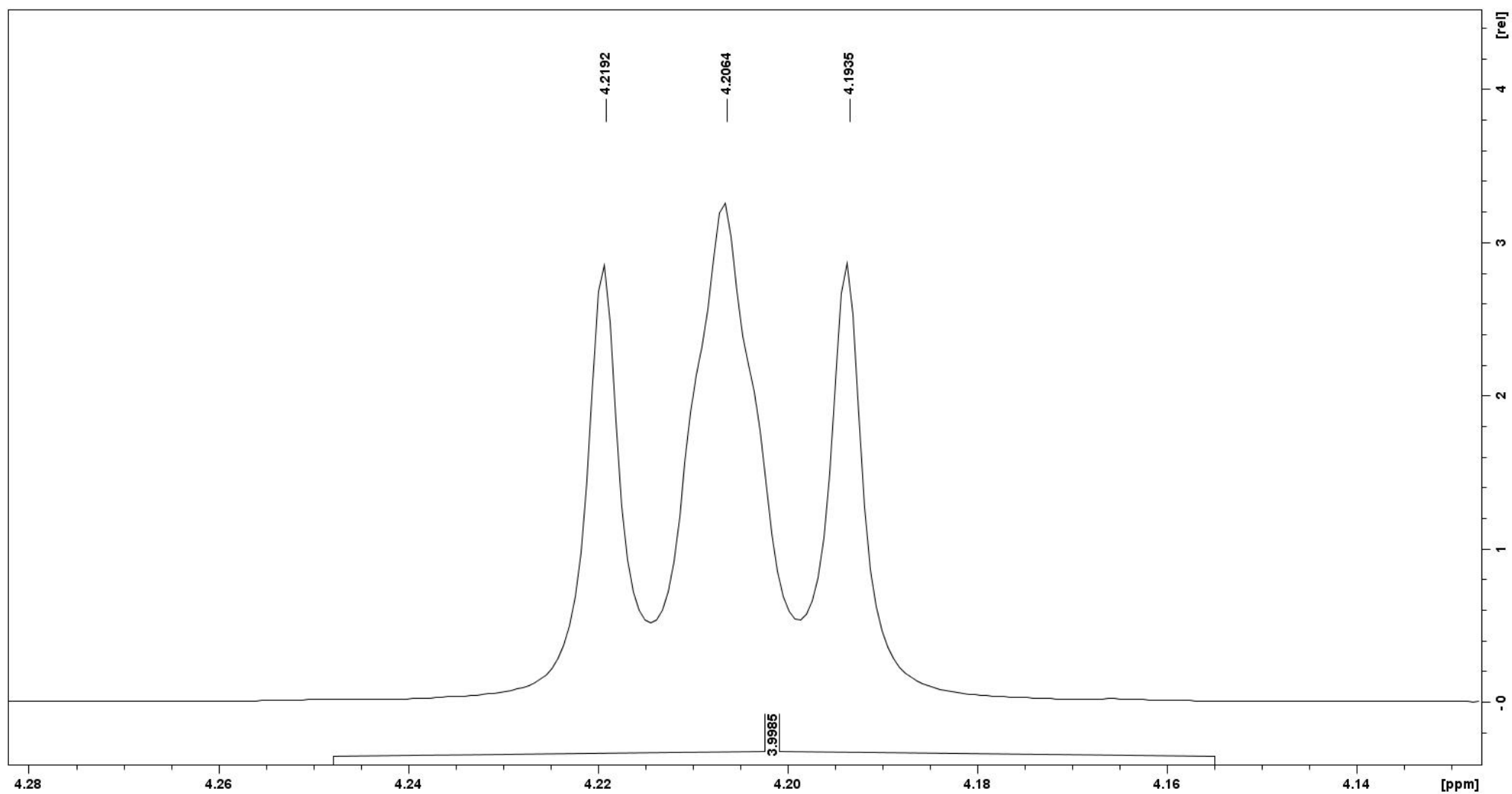
Expanded aliphatic region of $^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC6



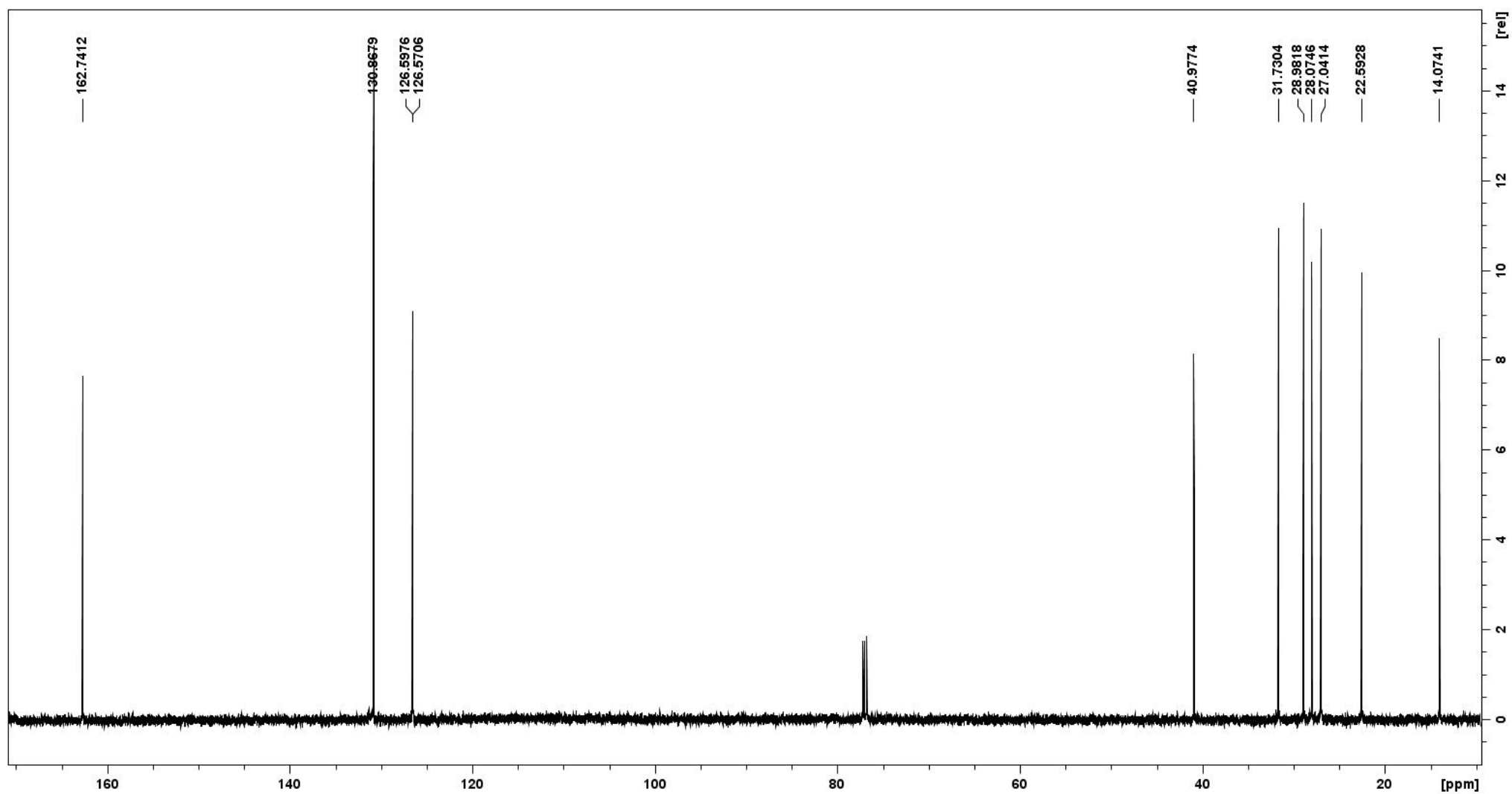
¹H NMR spectrum of NDIC7 (CDCl₃, 600MHz)



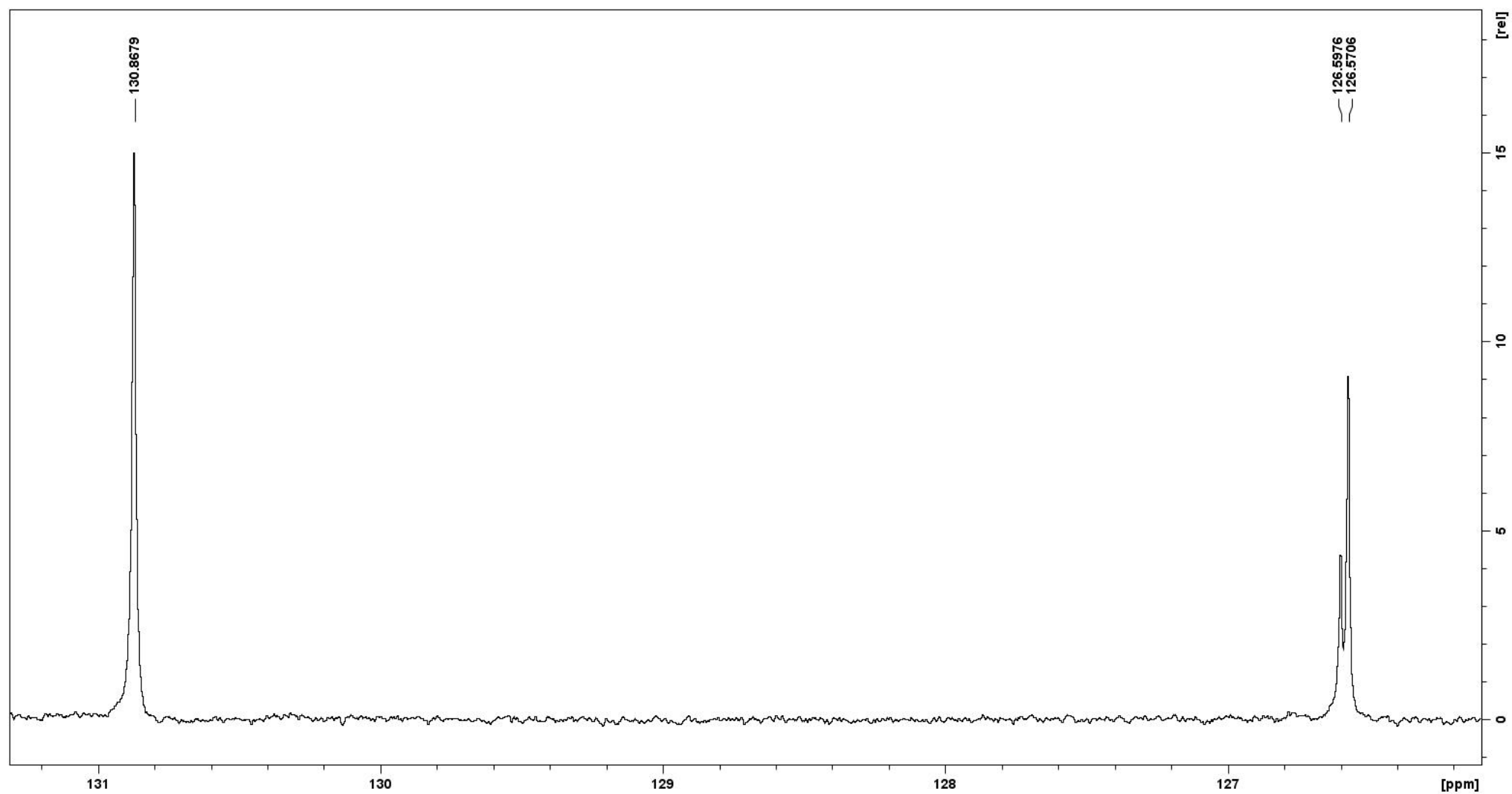
Expanded aliphatic region of ^1H NMR spectrum of NDIC7



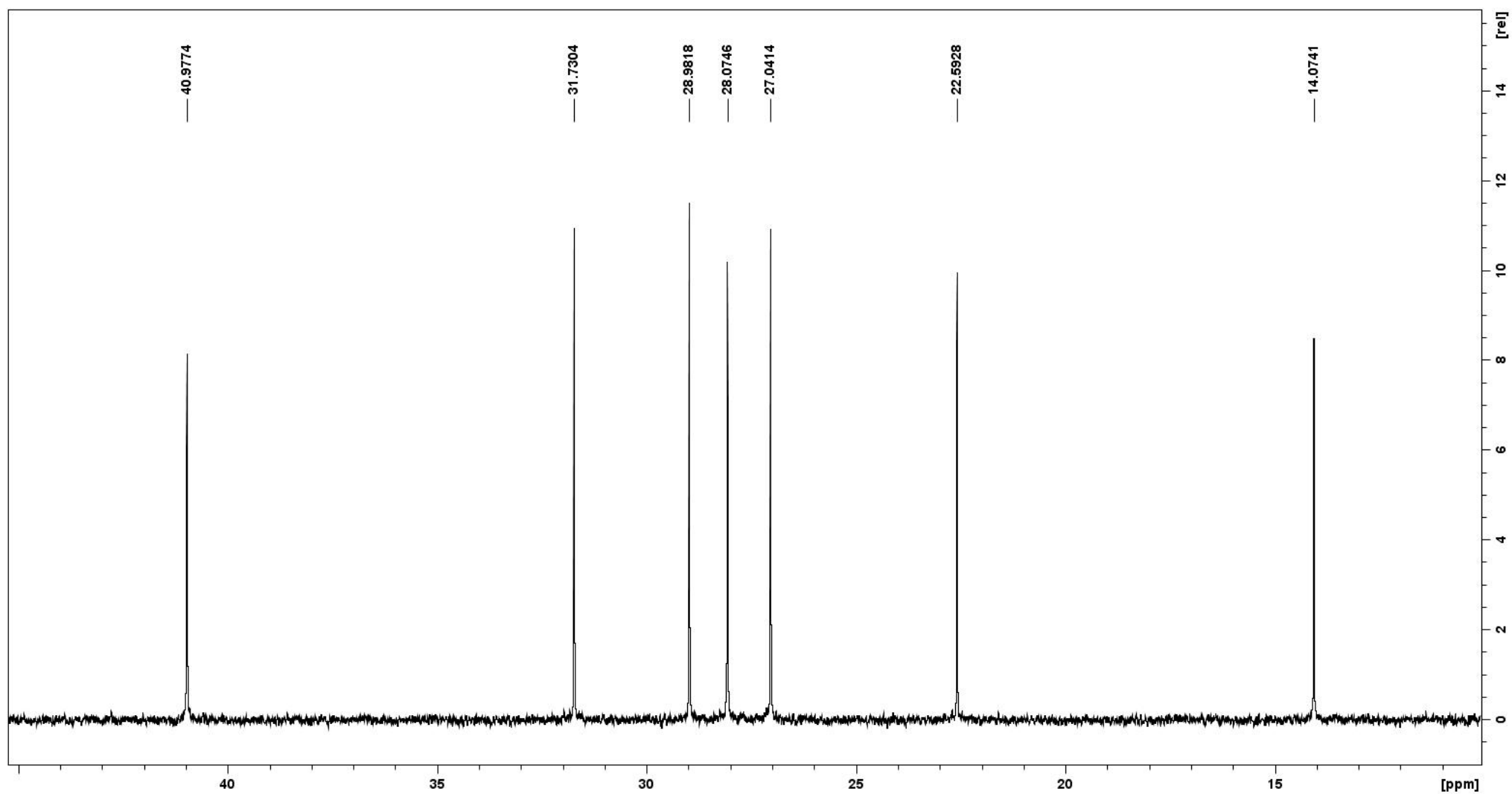
Expanded aliphatic region of ^1H NMR spectrum of NDIC7



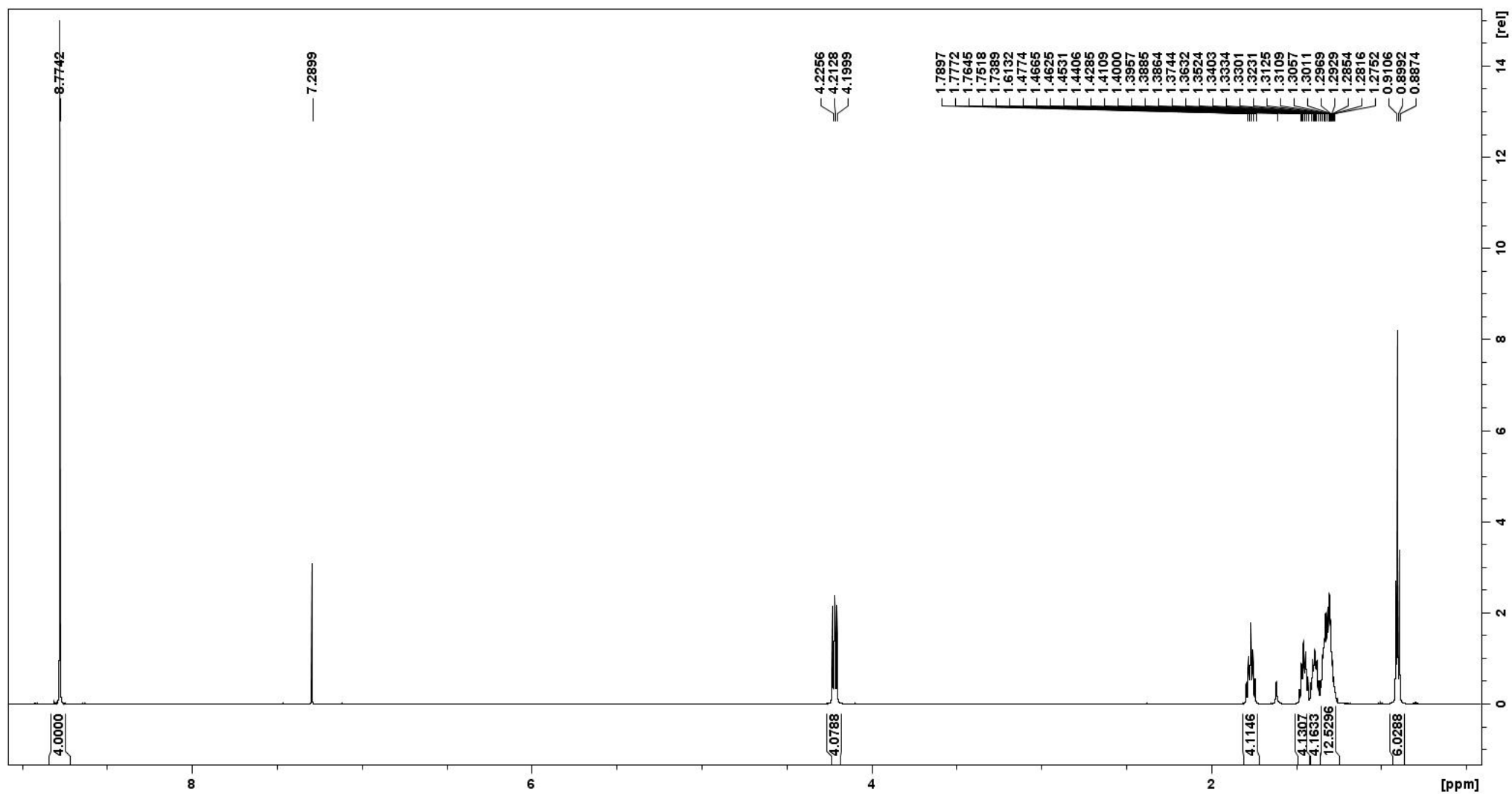
$^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC7 (CDCl_3 , 151 MHz)



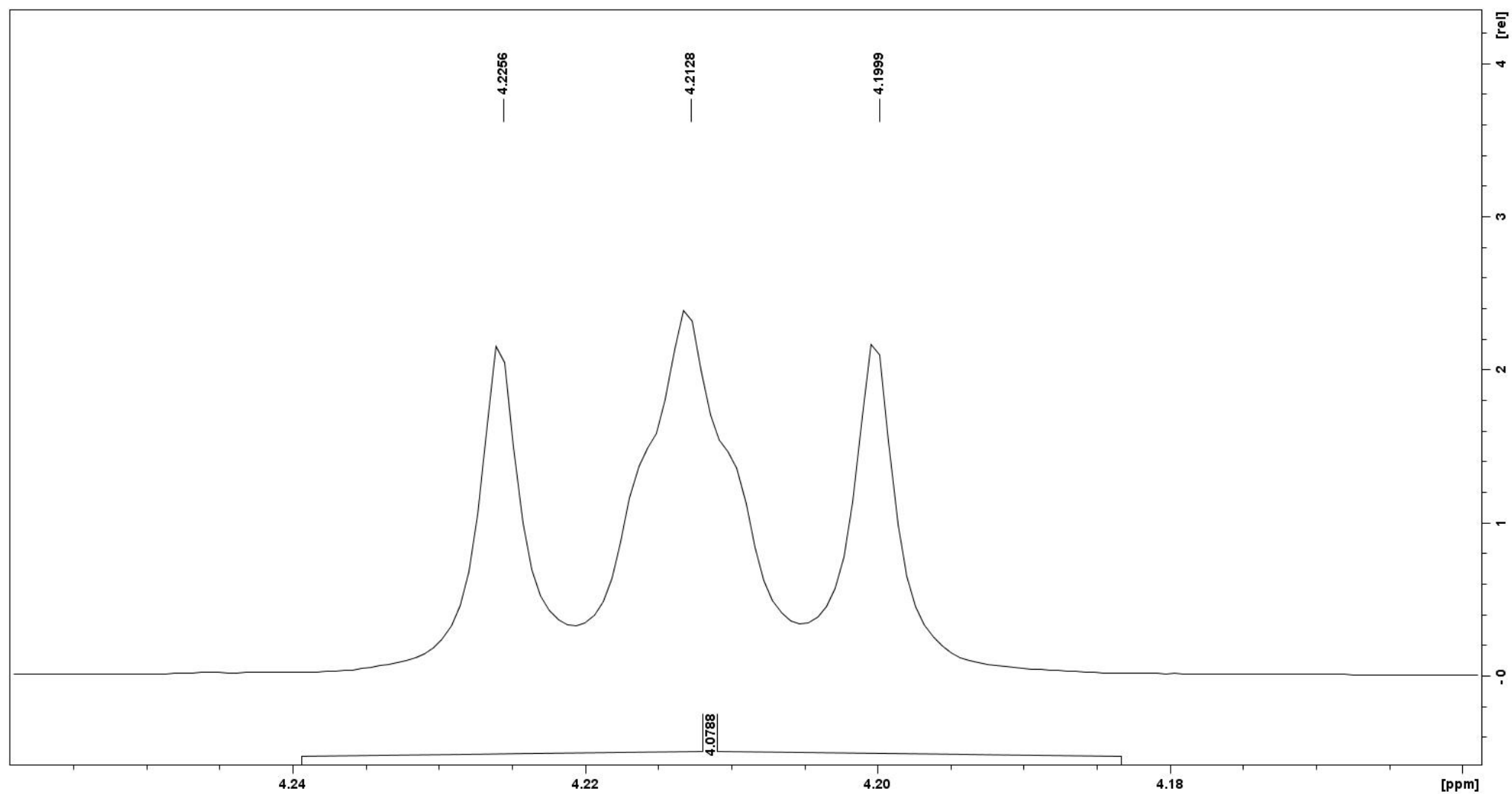
Expanded aromatic region of $^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC7



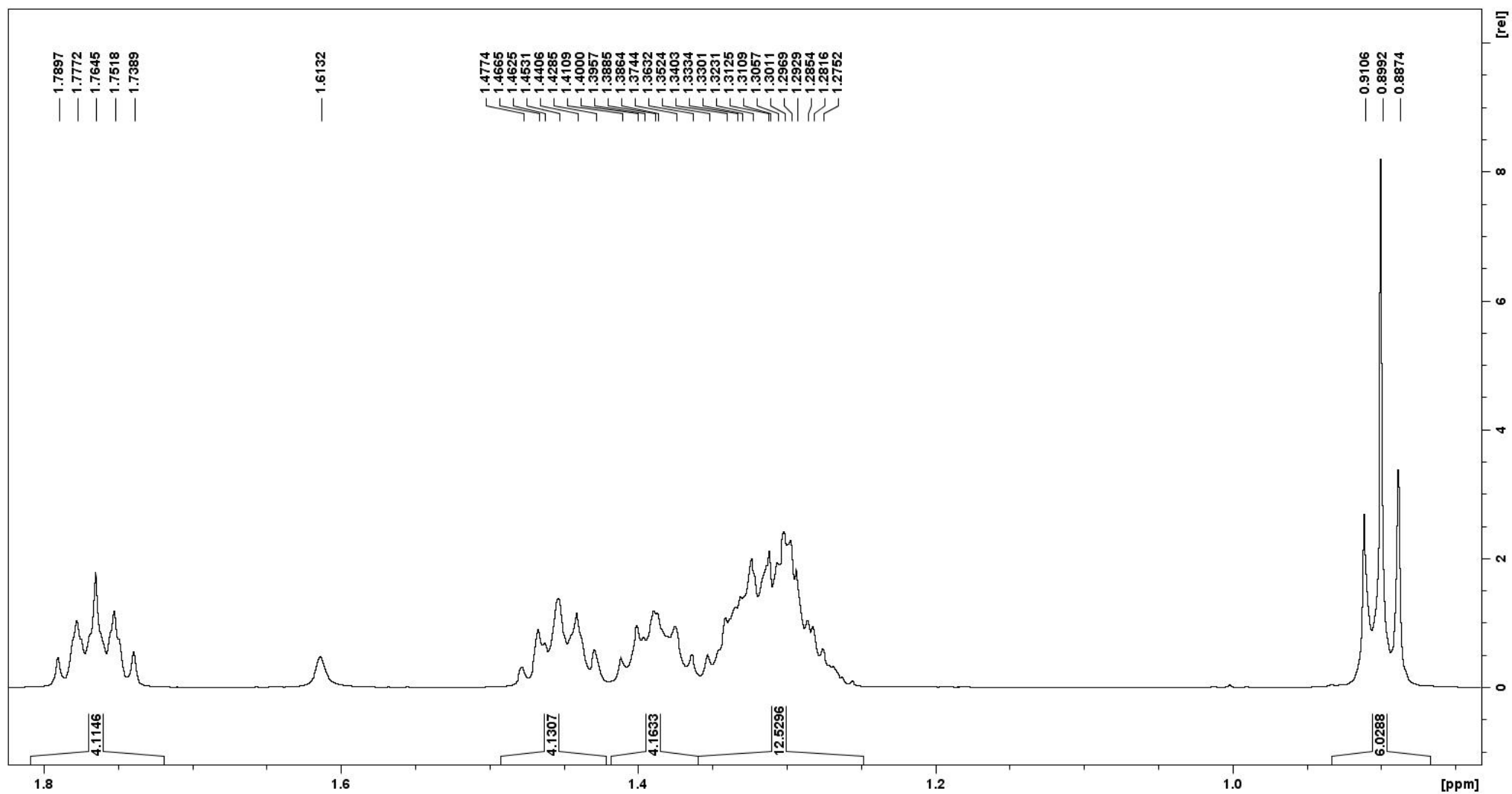
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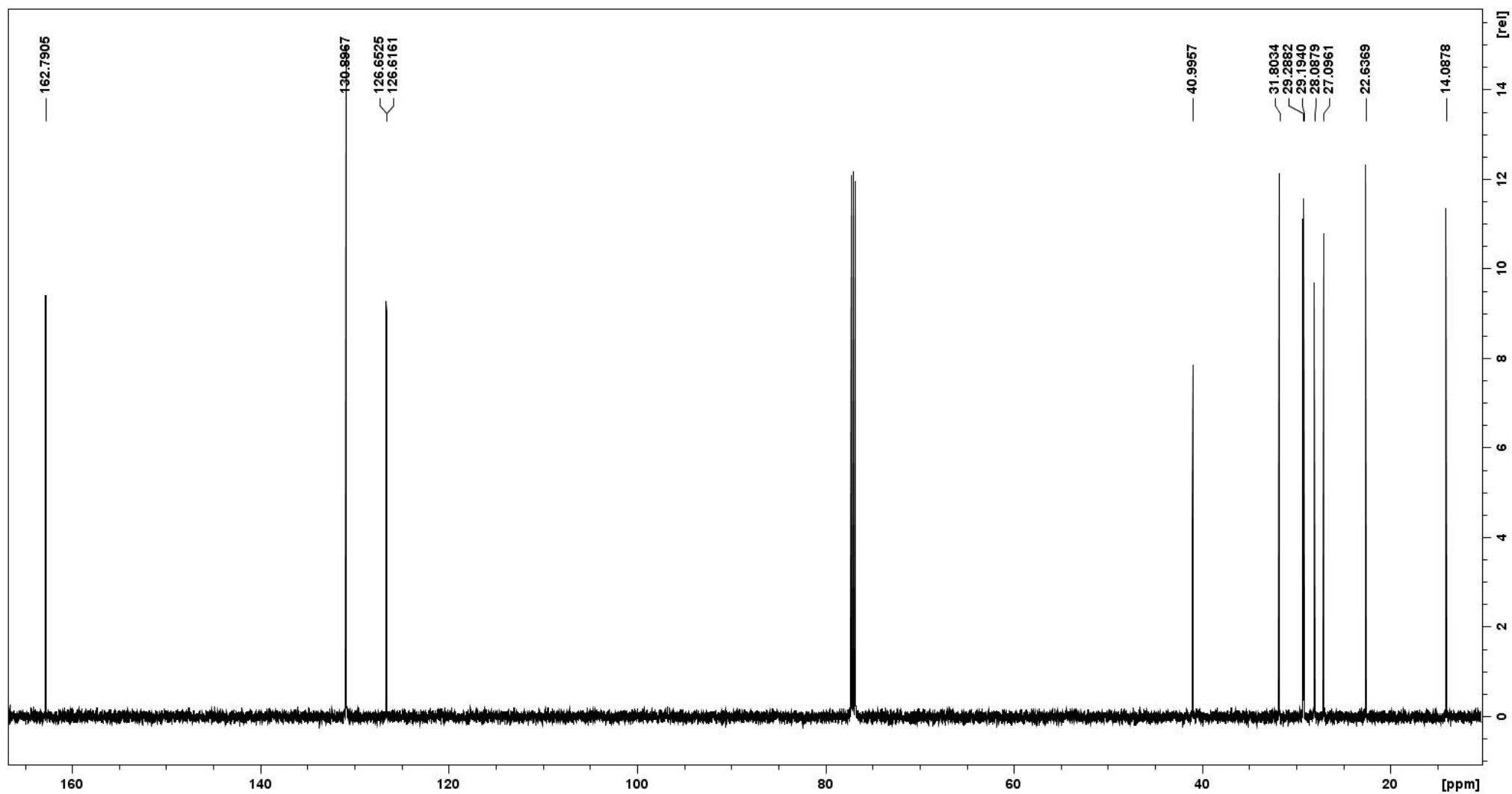
¹H NMR spectrum of NDIC8 (CDCl₃, 600MHz)



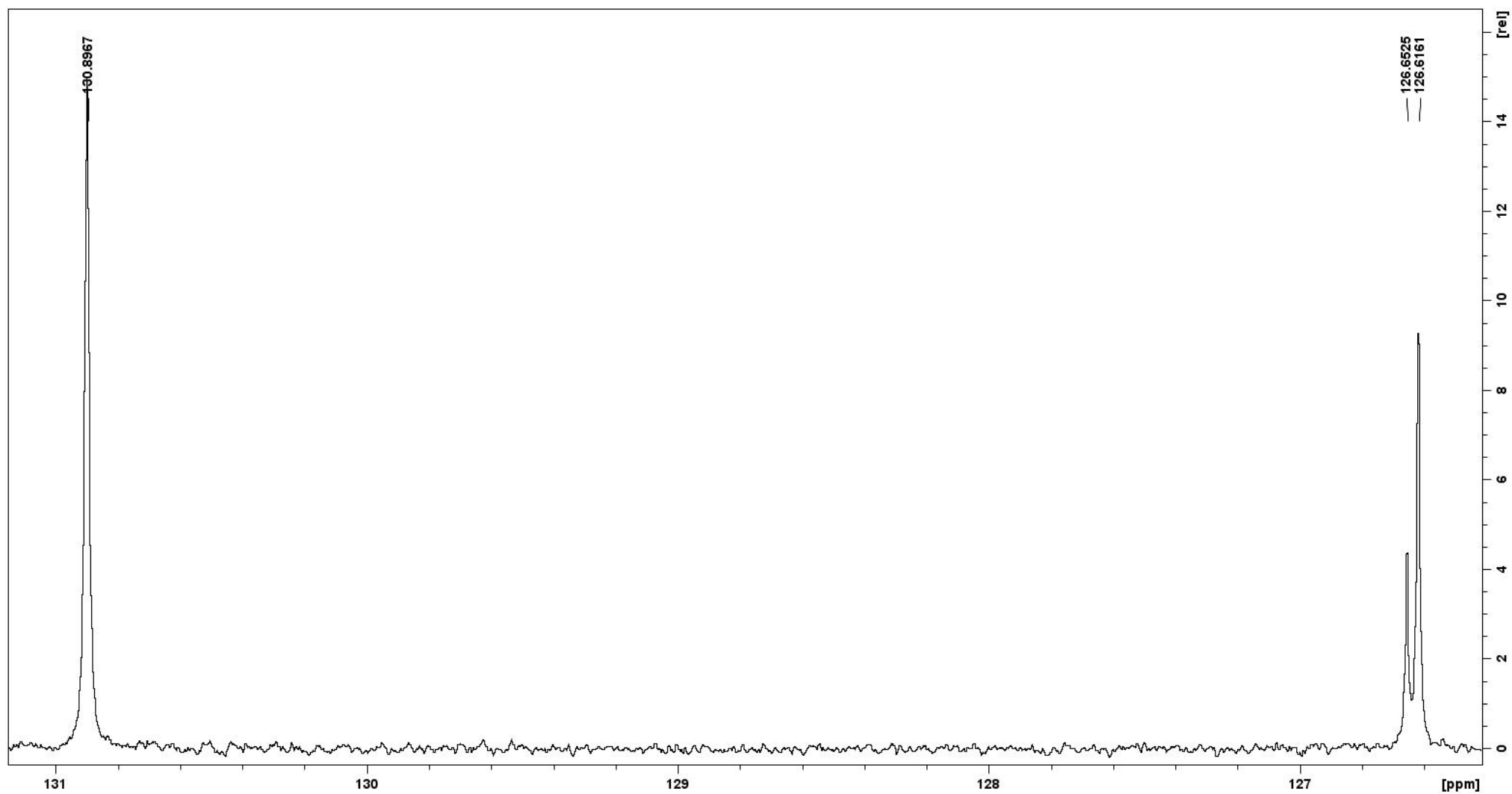
Expanded aliphatic region of ^1H NMR spectrum of NDIC8



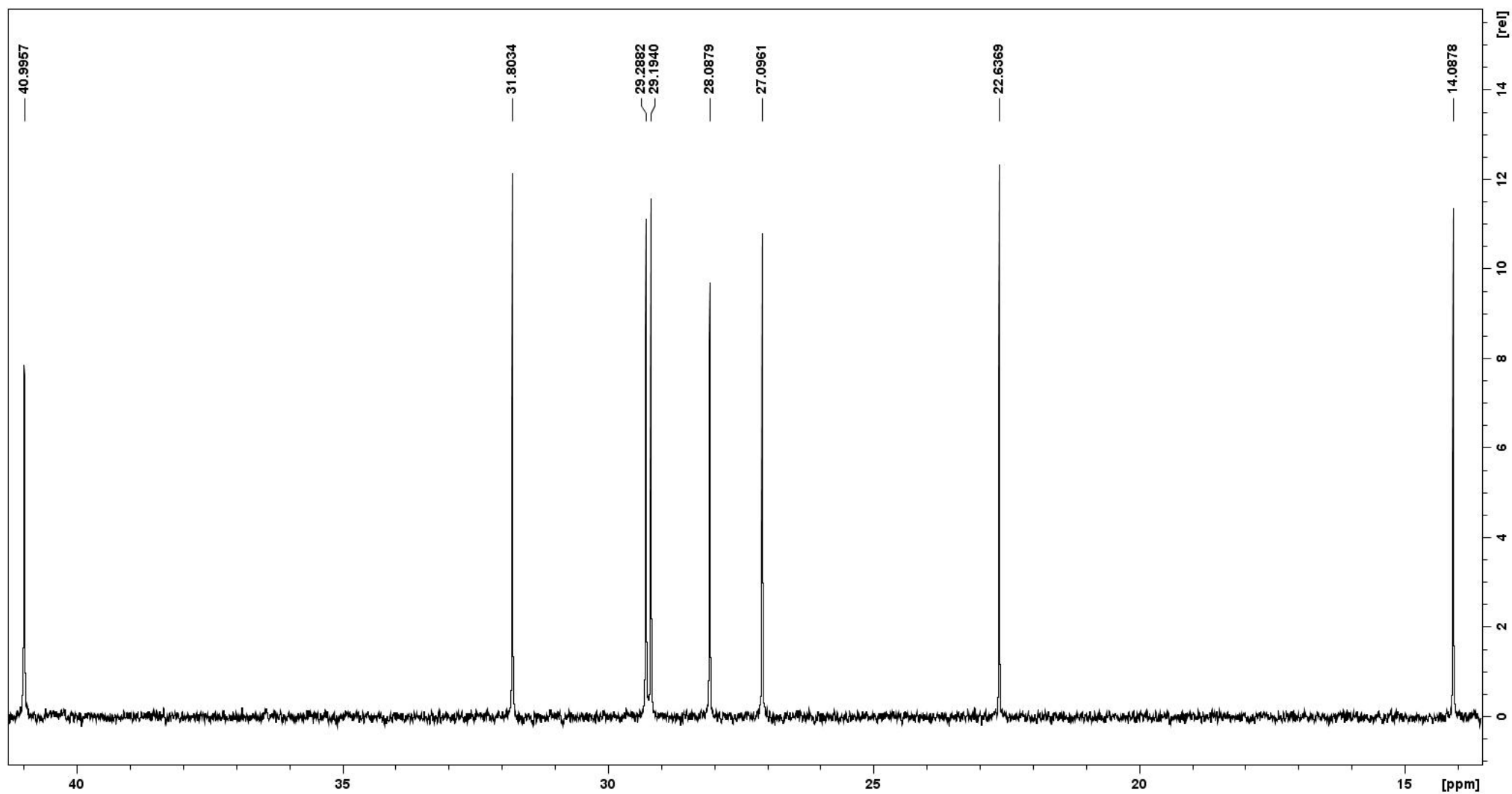
Expanded aliphatic region of ^1H NMR spectrum of NDIC8



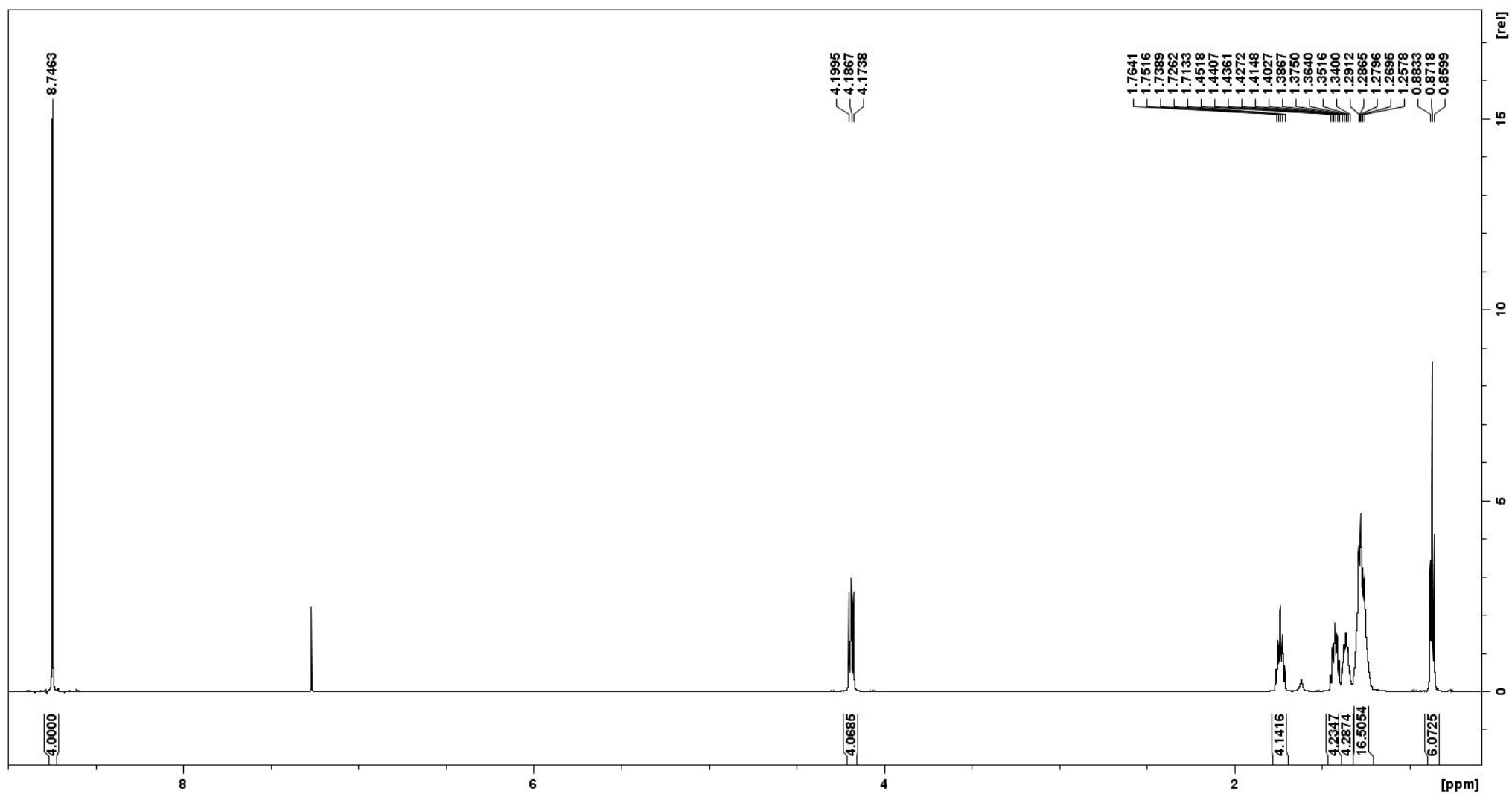
$^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC8 (CDCl_3 , 151 MHz)



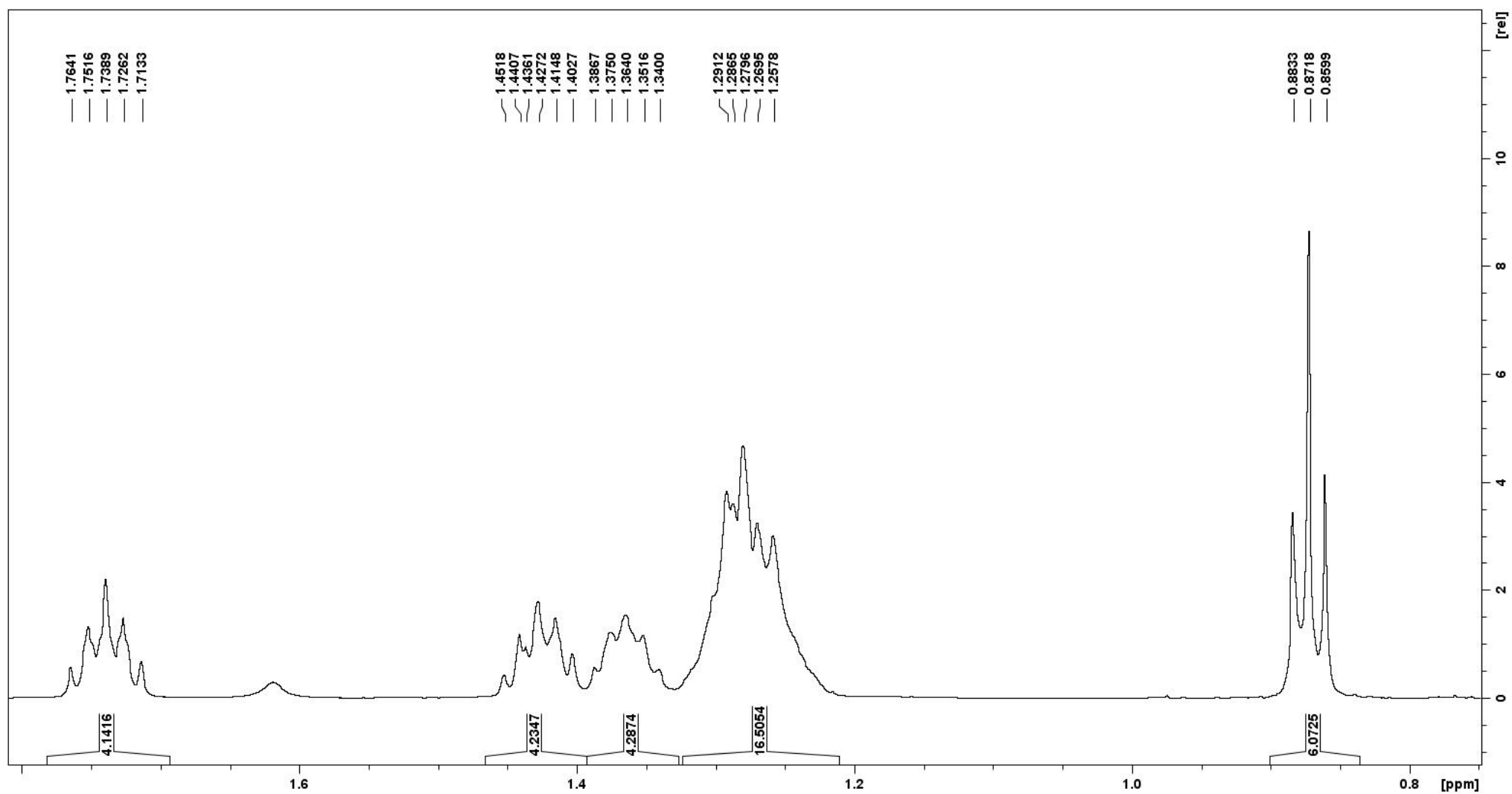
Expanded aromatic region of $^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC8



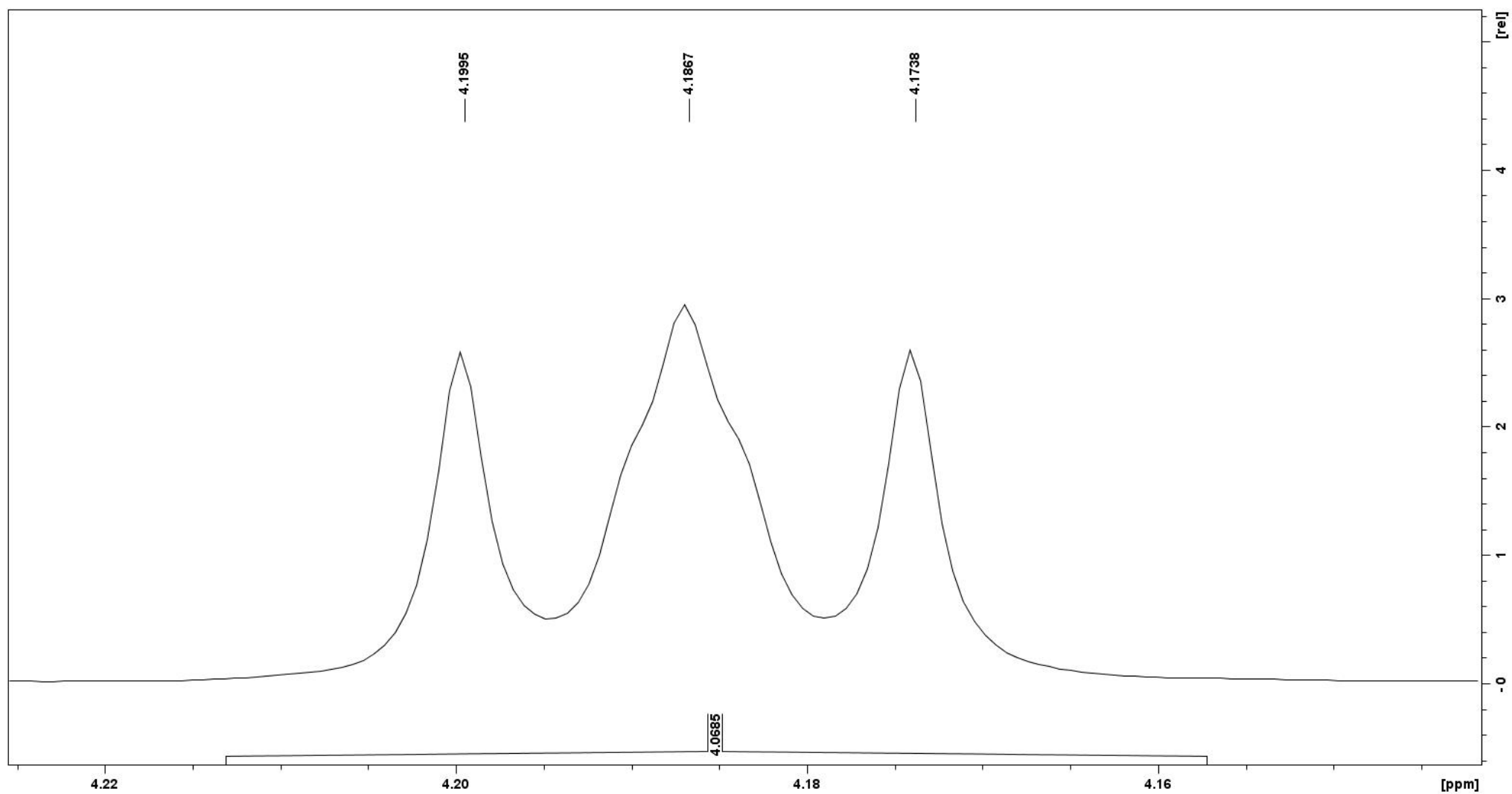
Expanded aliphatic region of $^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC8



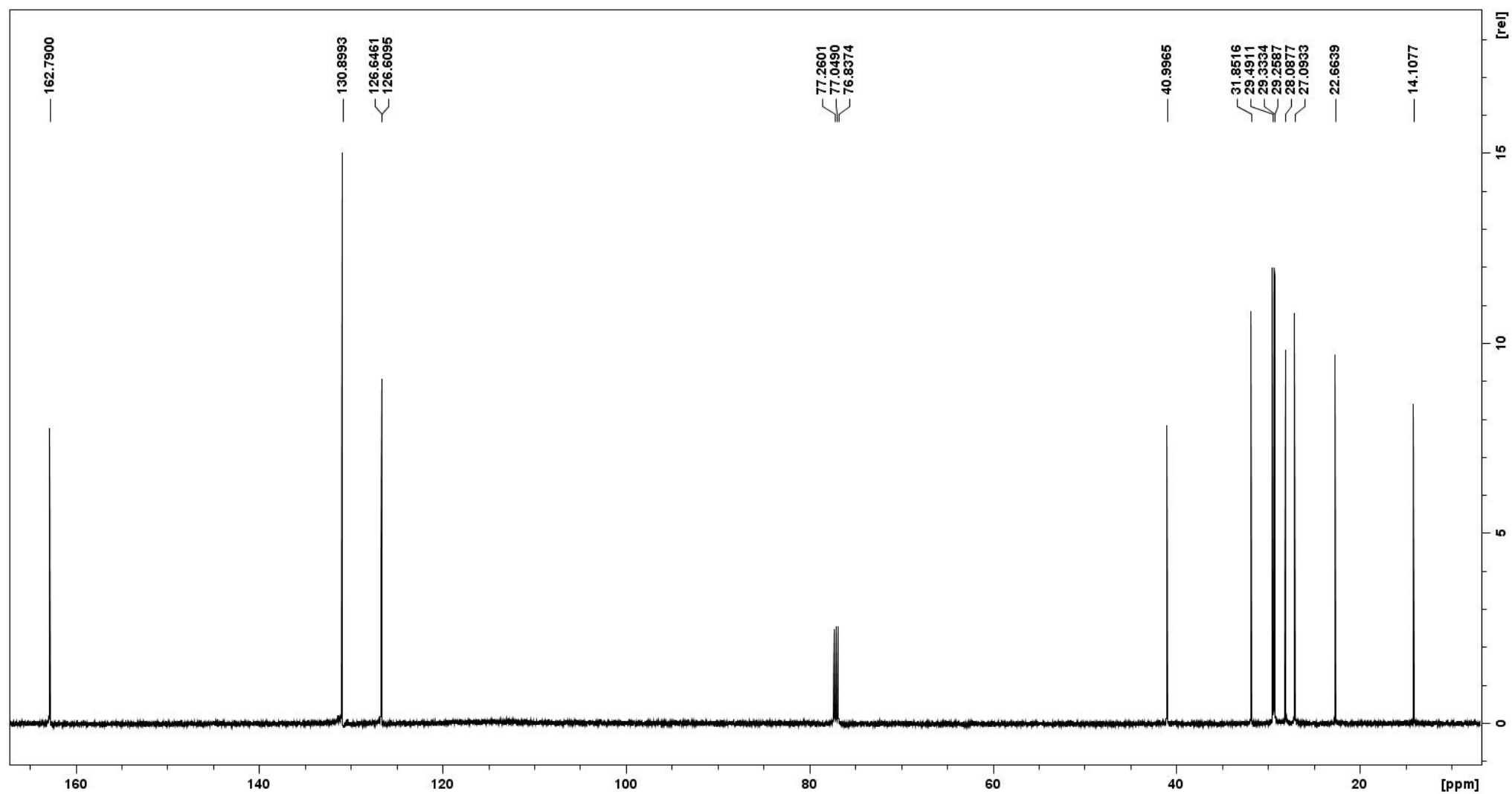
¹H NMR spectrum of NDIC9 (CDCl₃, 600MHz)



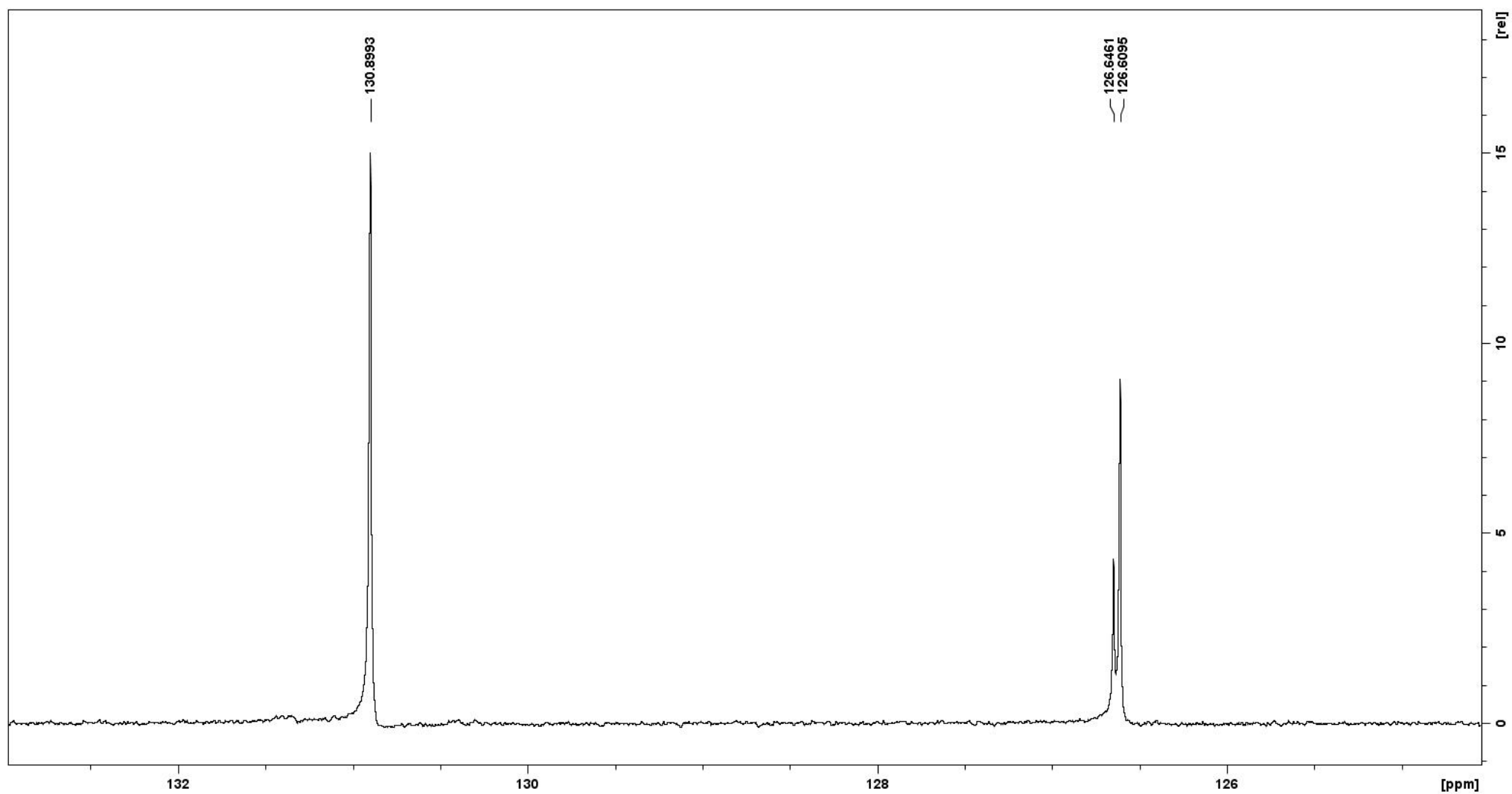
Expanded aliphatic region of ^1H NMR spectrum of NDIC9



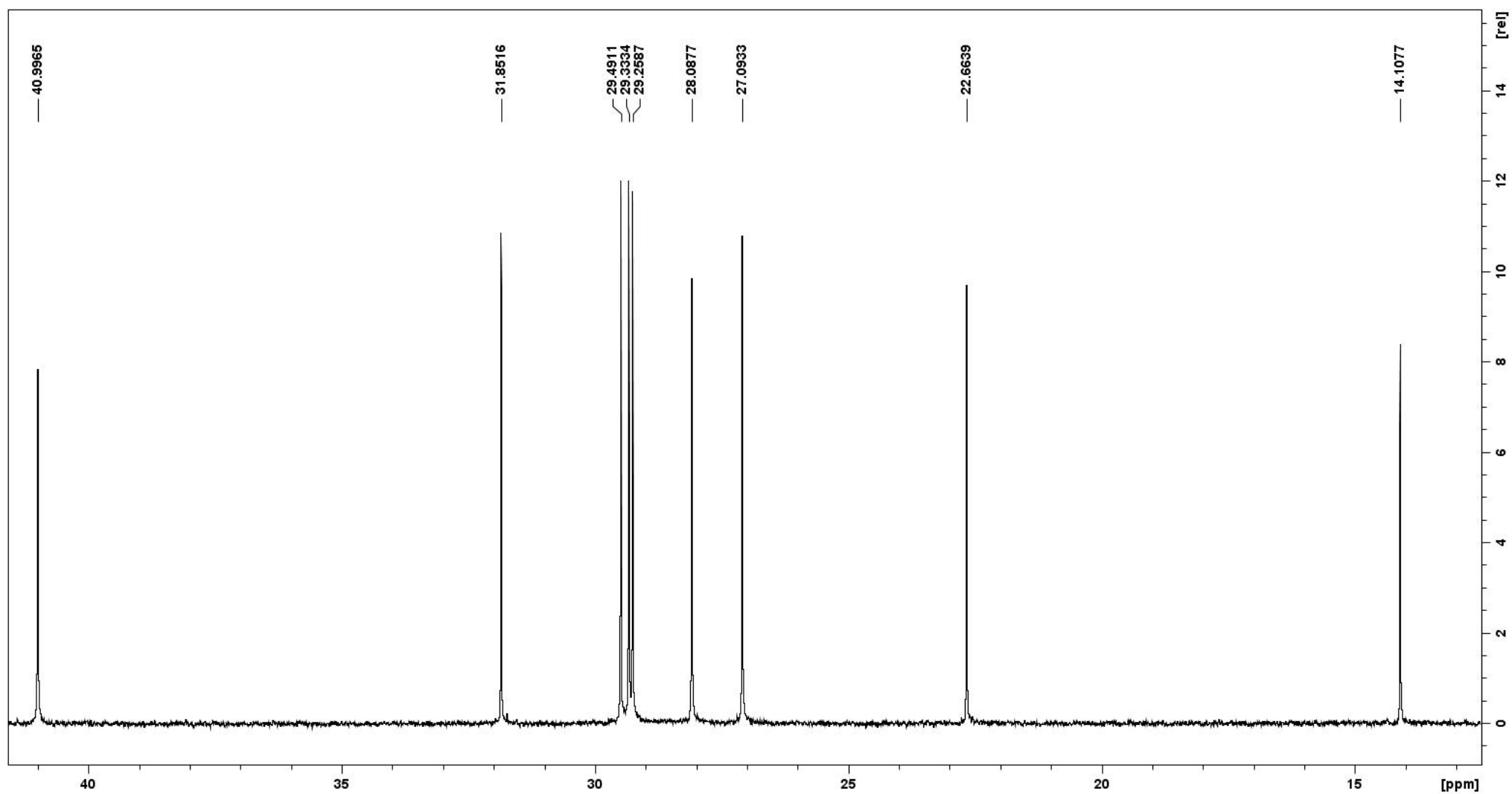
Expanded aliphatic region of ^1H NMR spectrum of NDIC9



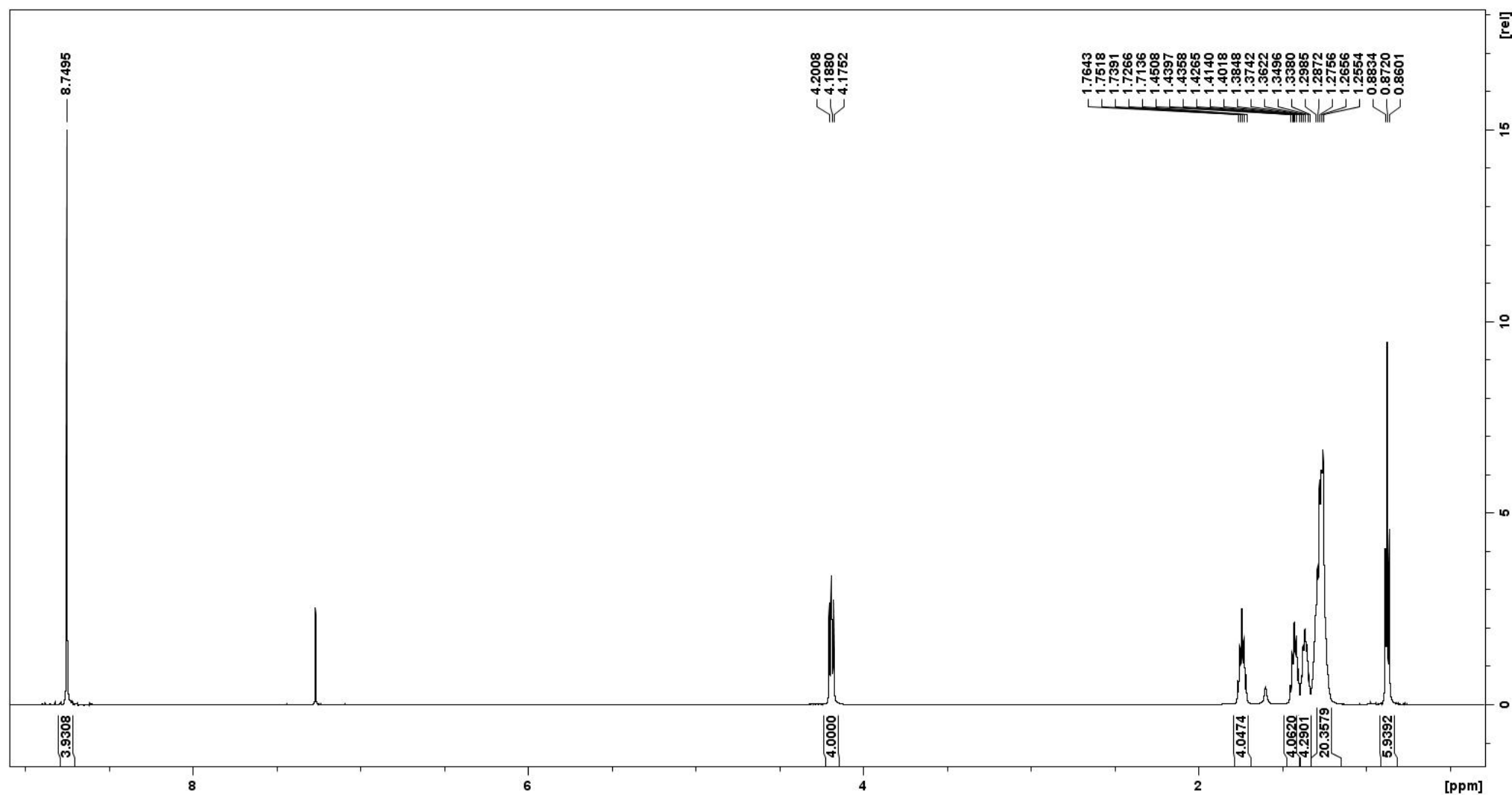
$^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC9(CDCl_3 , 151MHz)



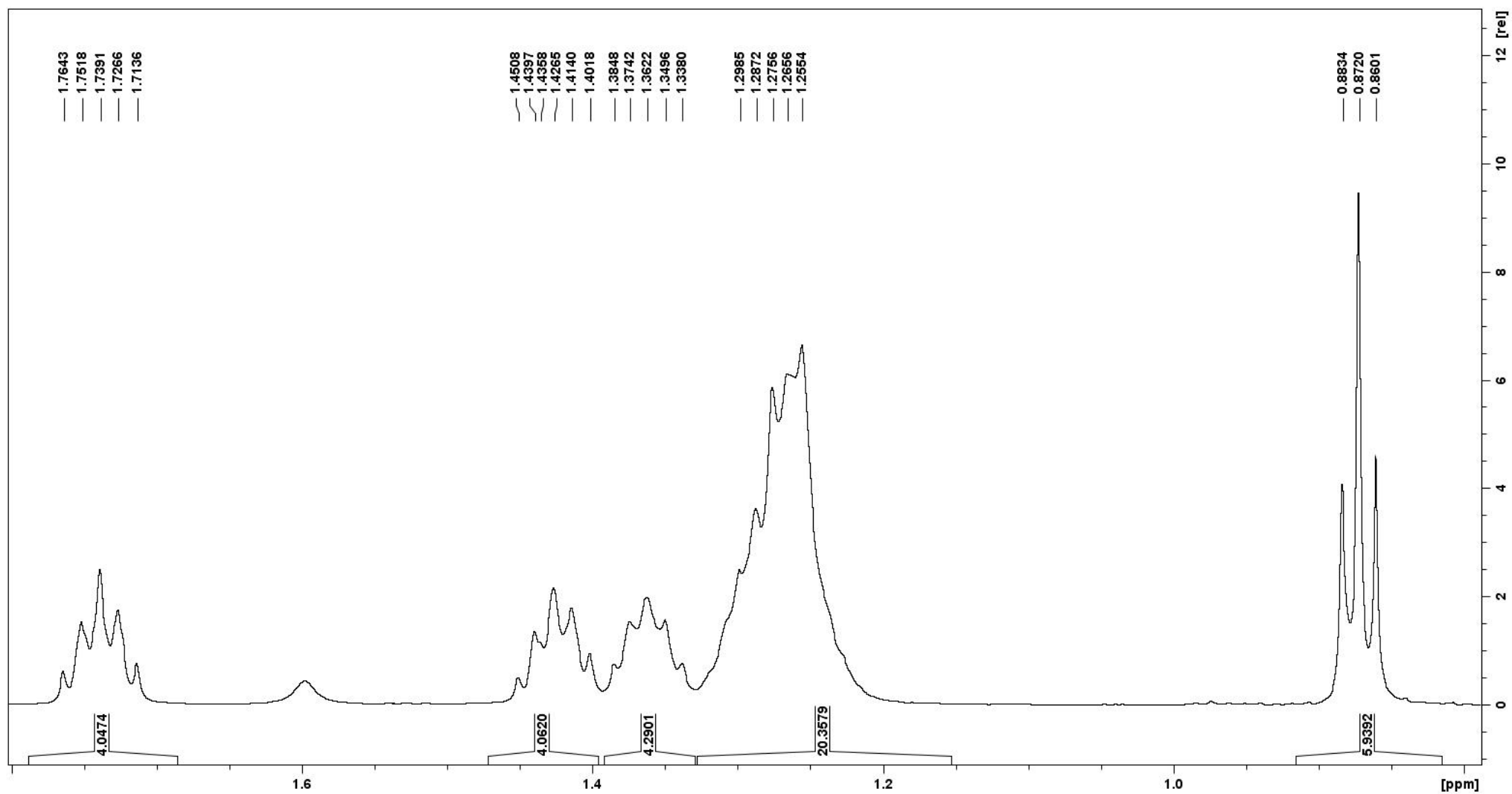
Expanded aromatic region of $^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC9



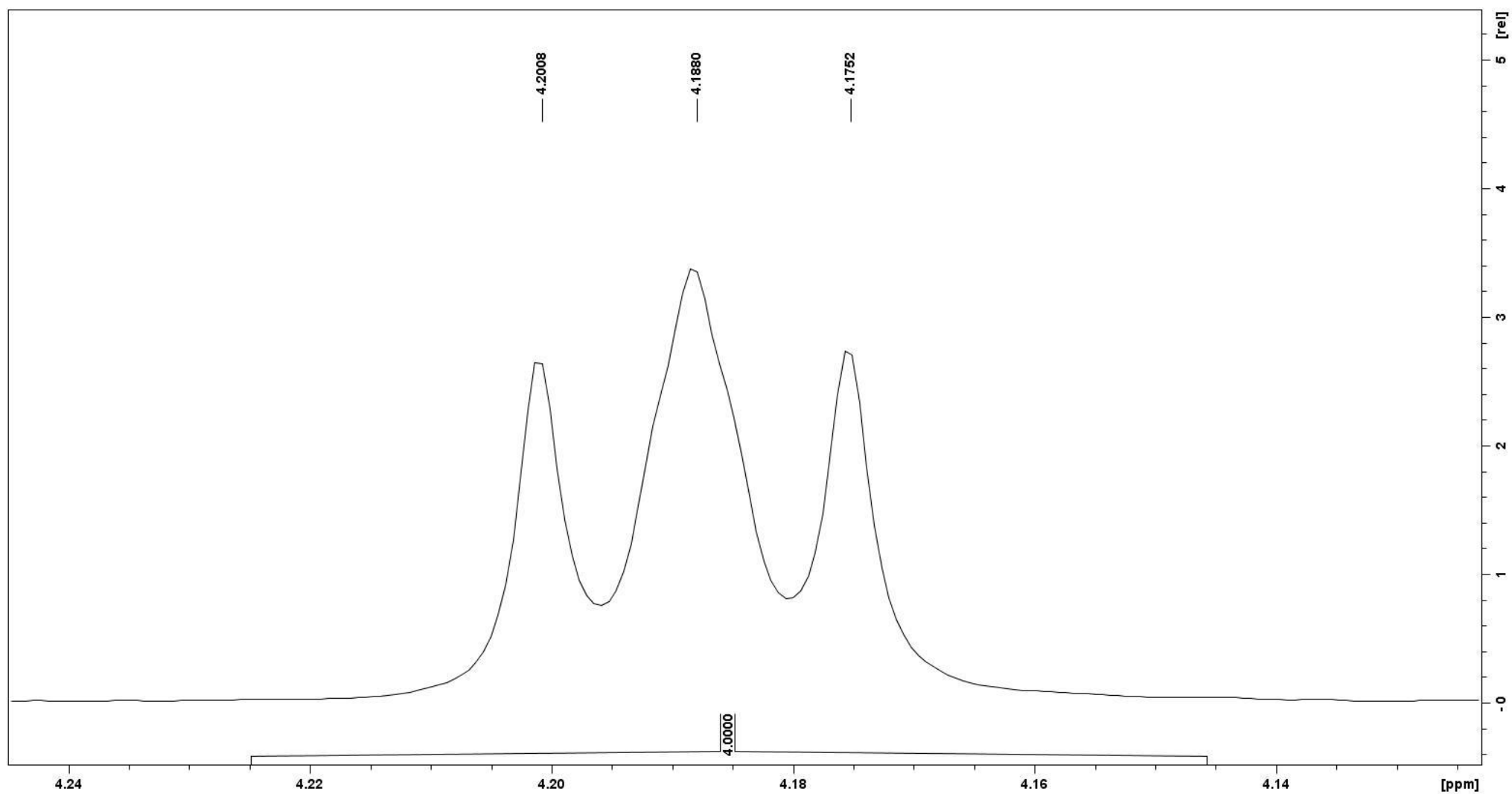
Expanded aliphatic region of $^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC9



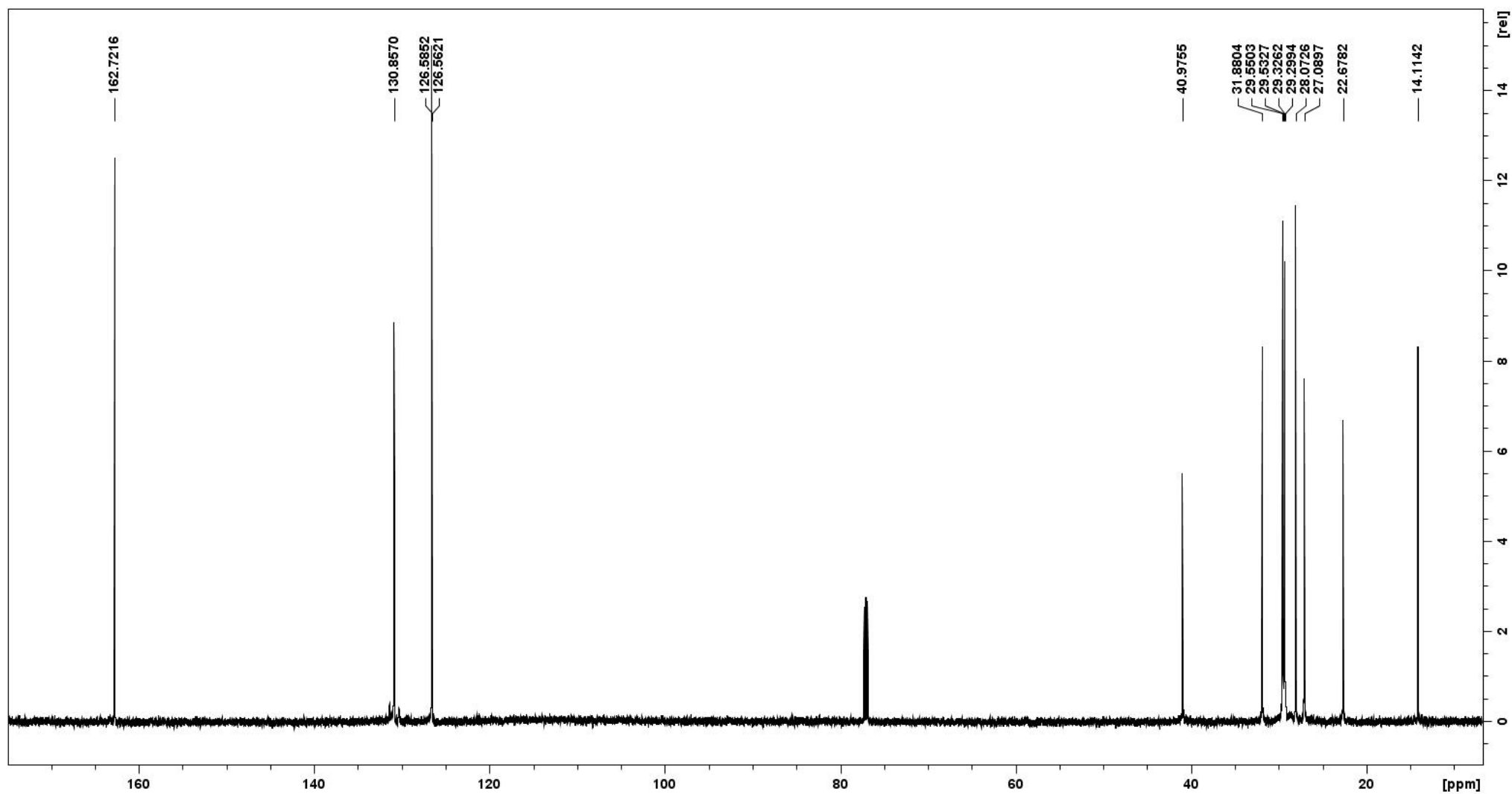
¹H NMR spectrum of NDIC10 (CDCl₃, 600MHz)



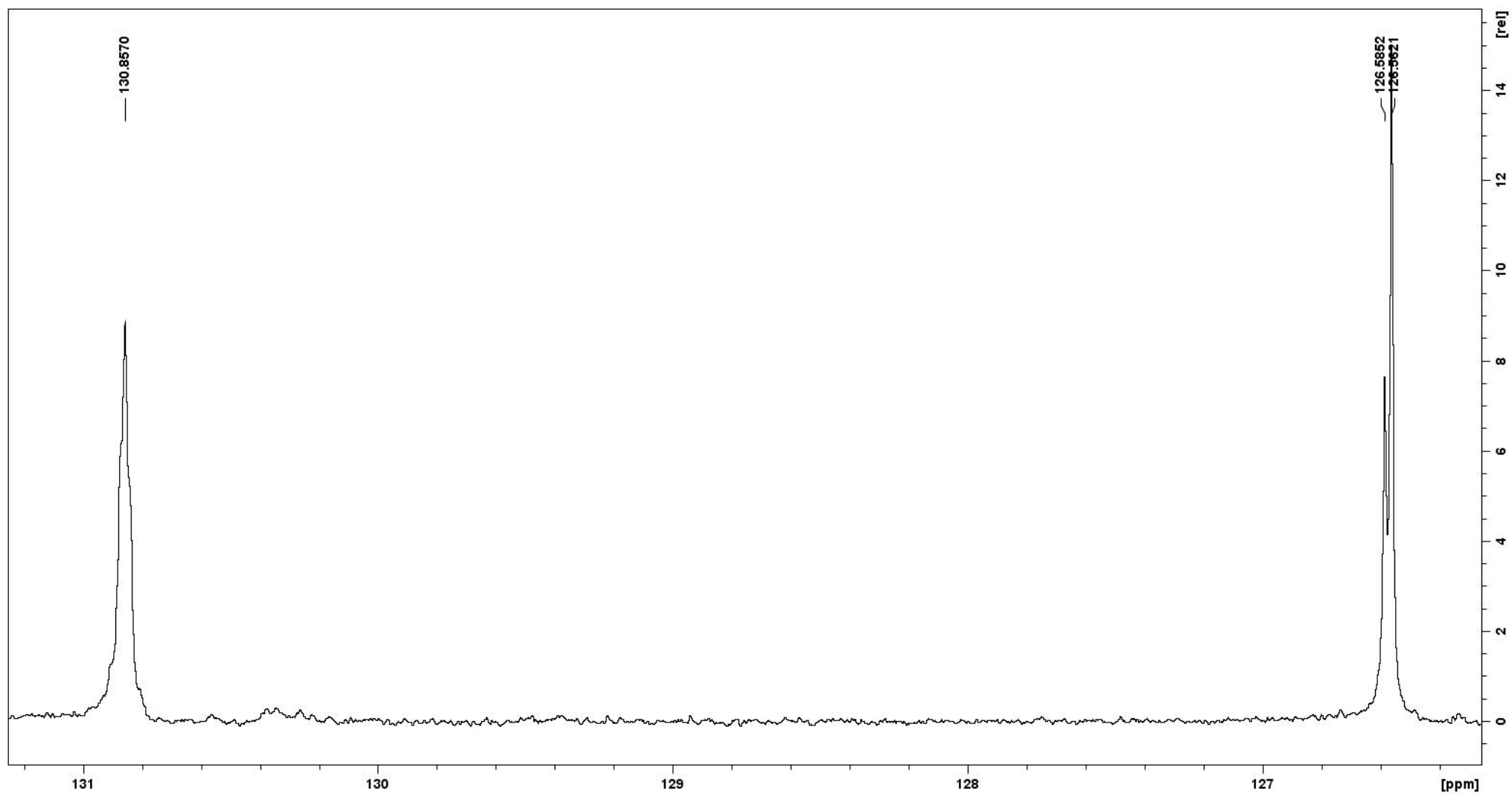
Expanded aliphatic region of ^1H NMR spectrum of NDIC10



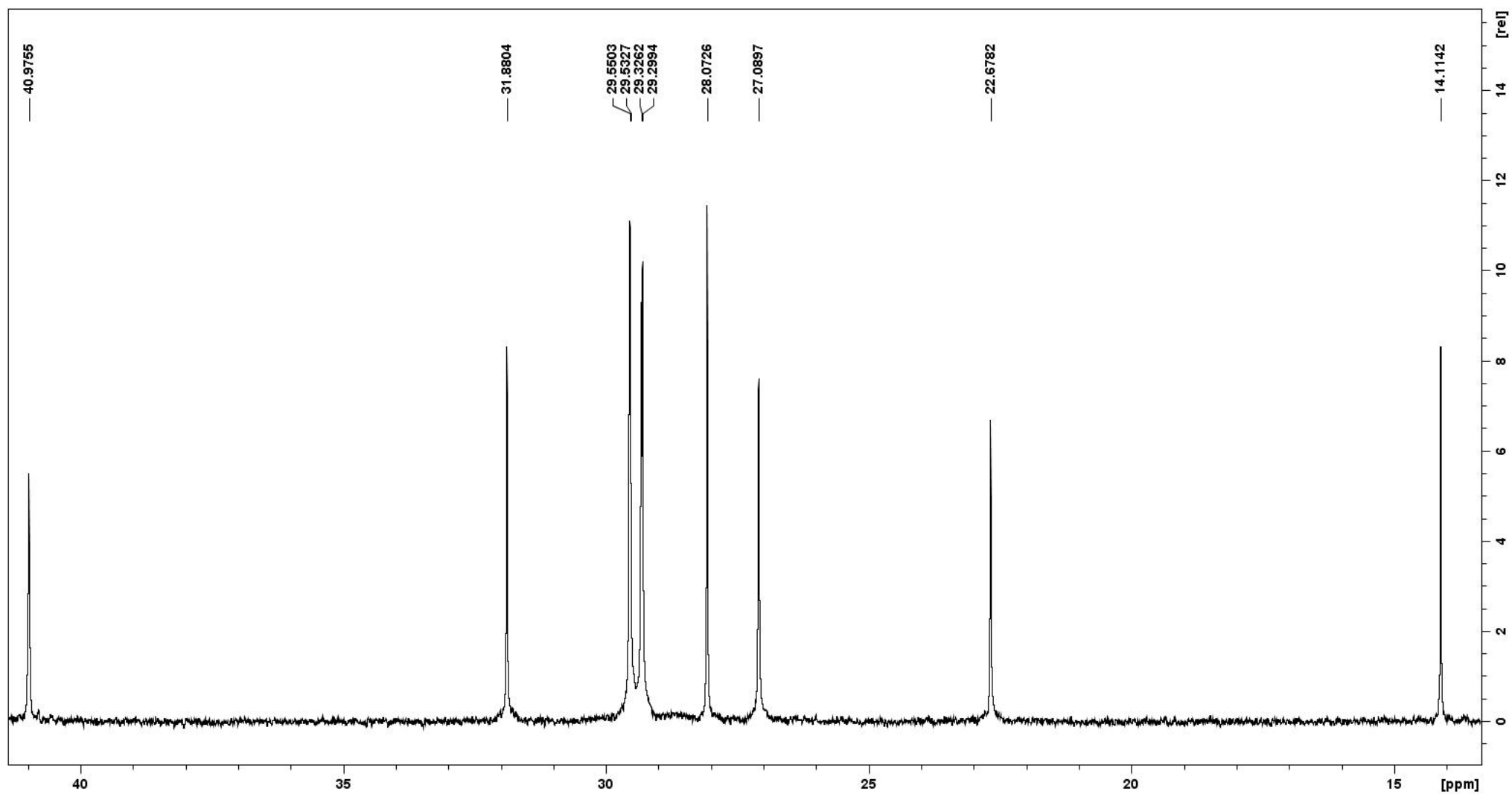
Expanded aliphatic region of ^1H NMR spectrum of NDIC10



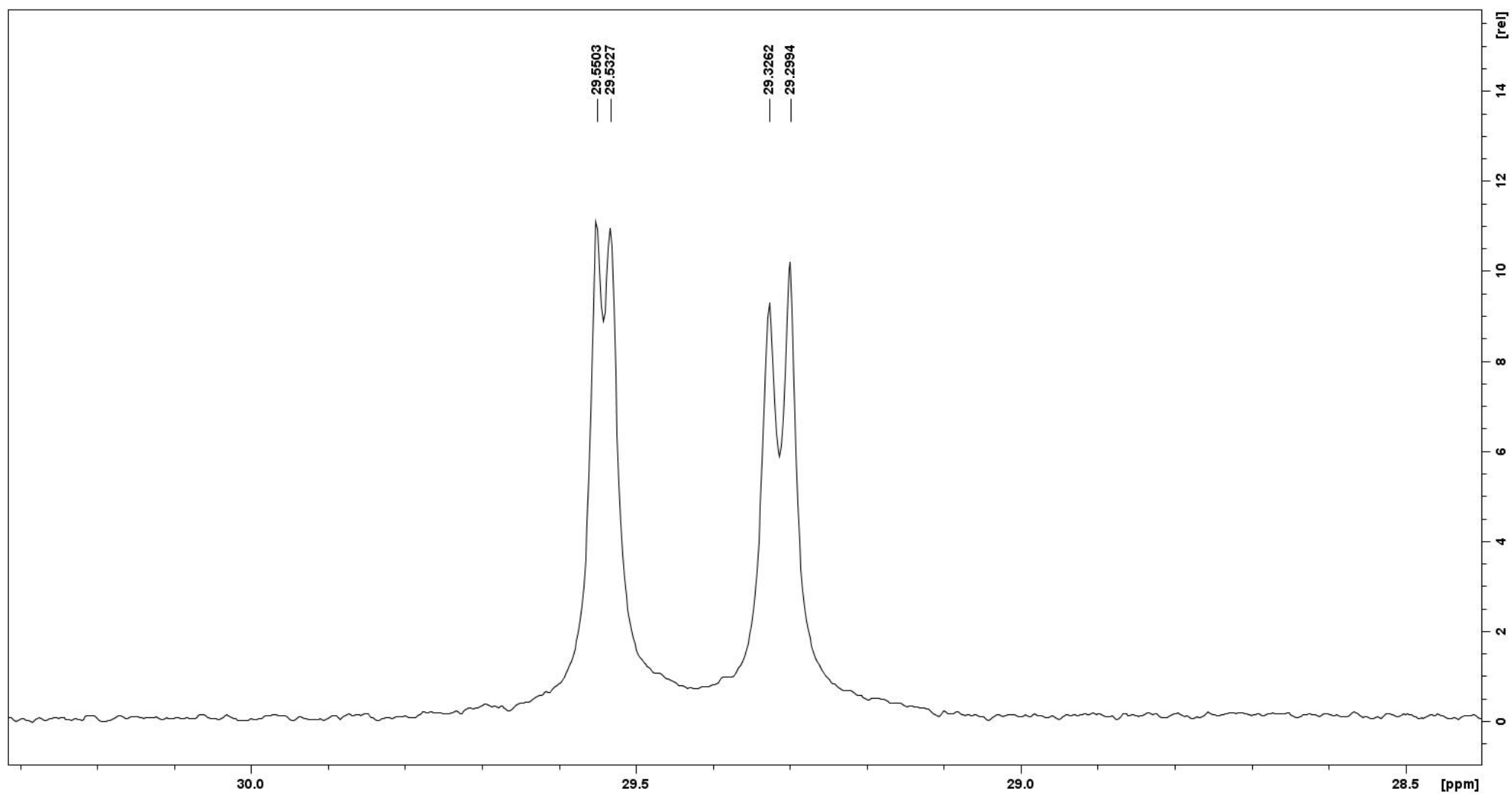
$^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC10 (CDCl_3 , 151 MHz)



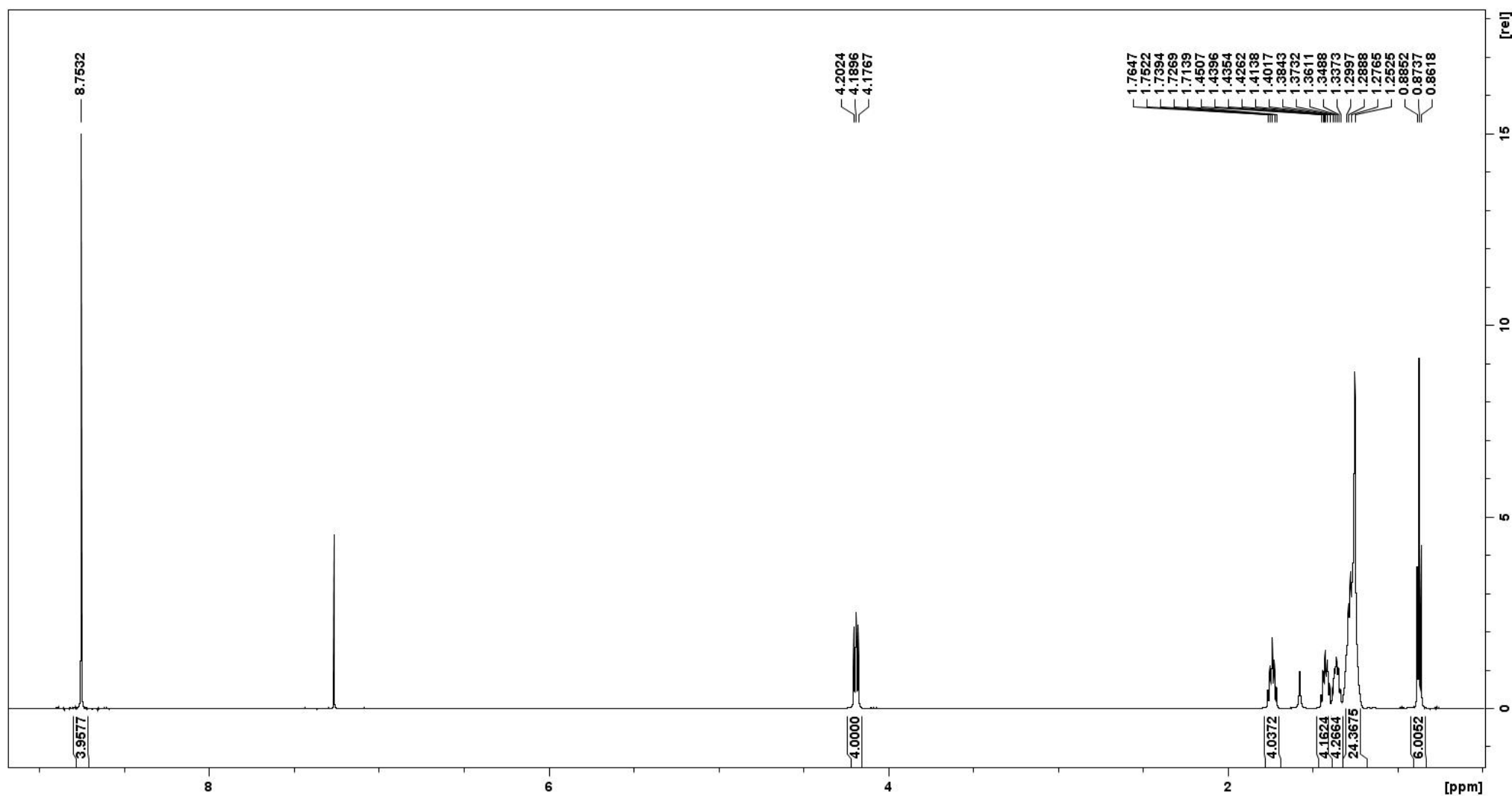
Expanded aromatic region of $^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC10



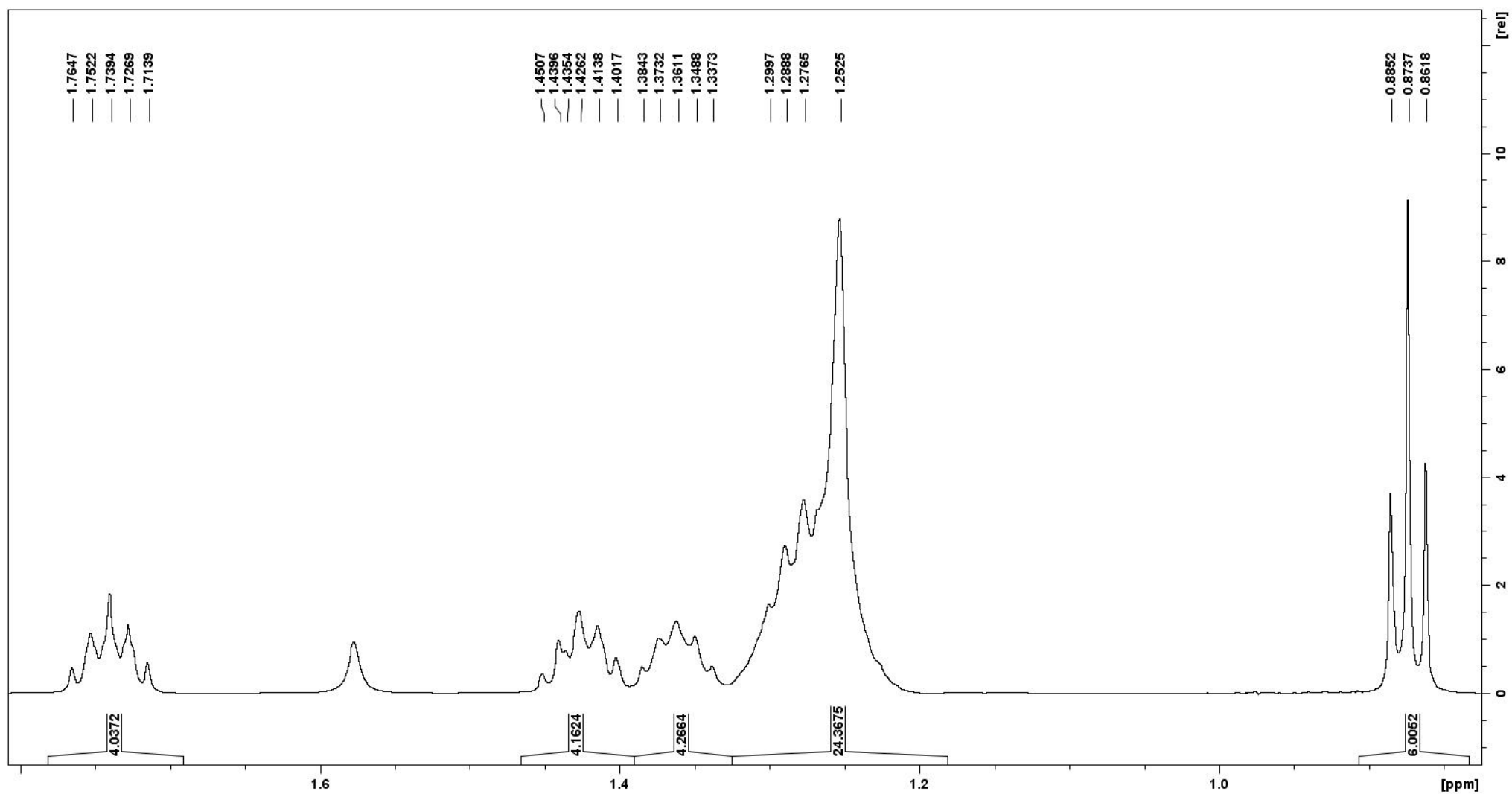
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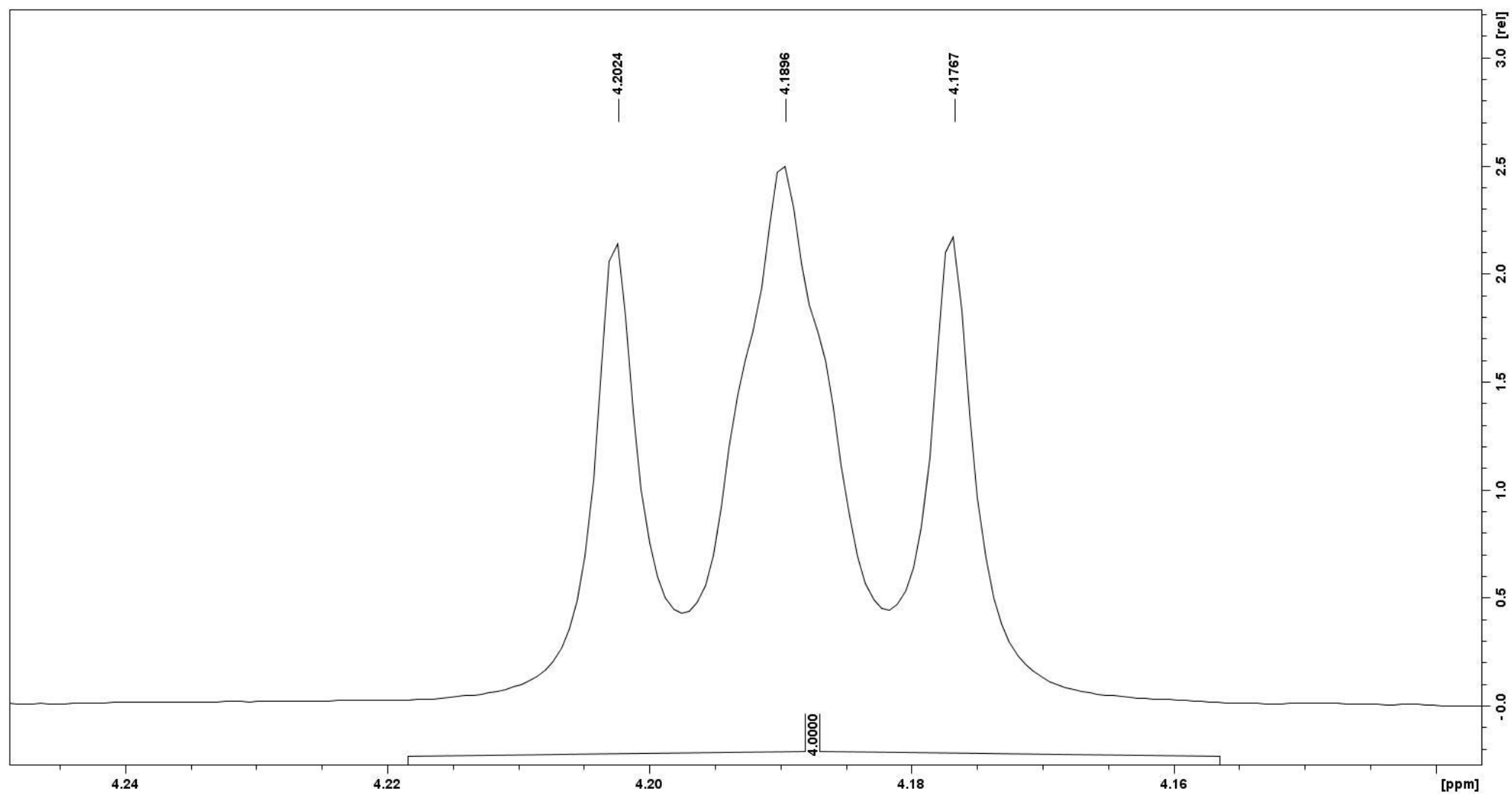
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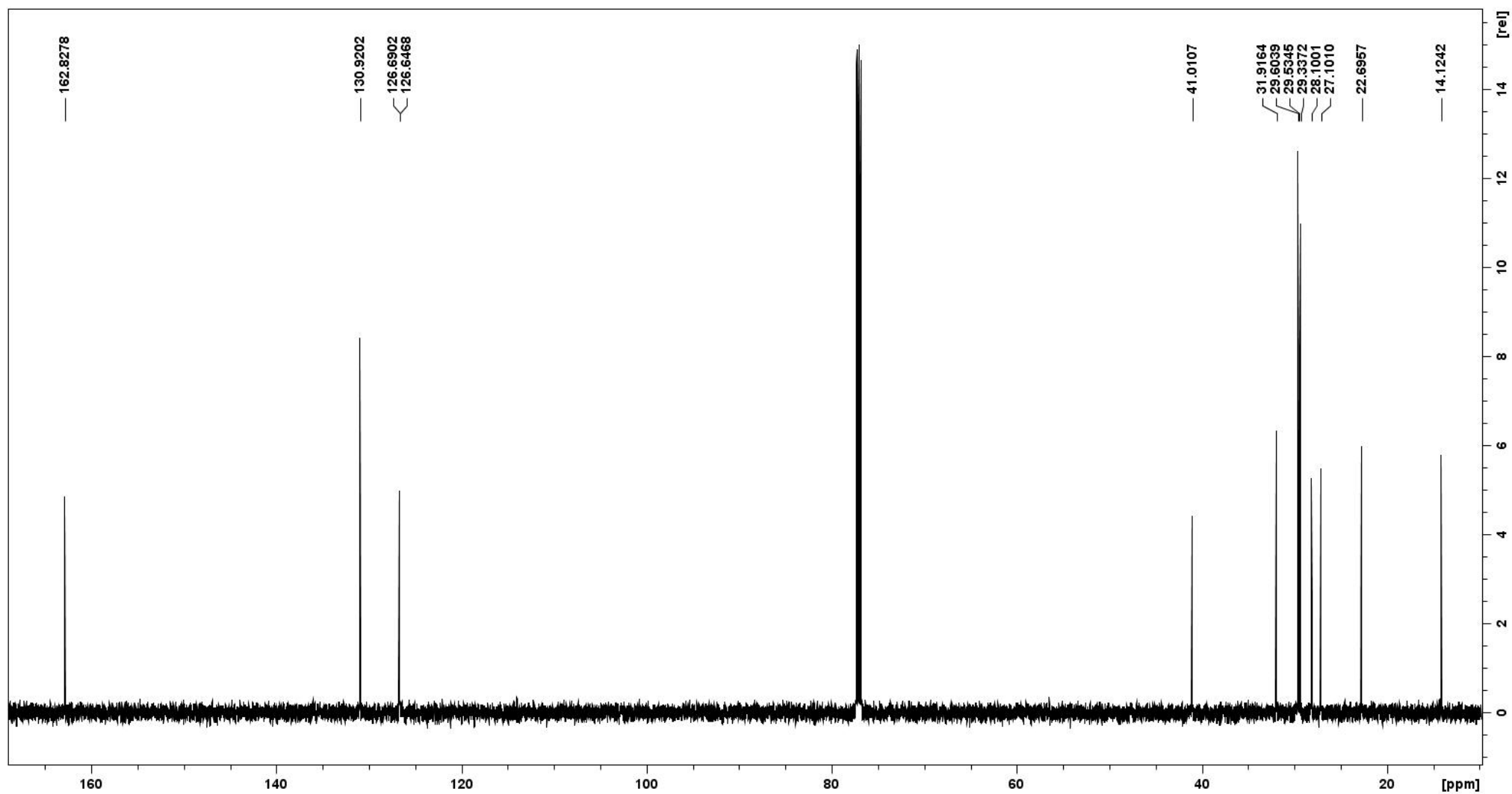
¹H NMR spectrum of NDIC11 (CDCl₃, 600MHz)



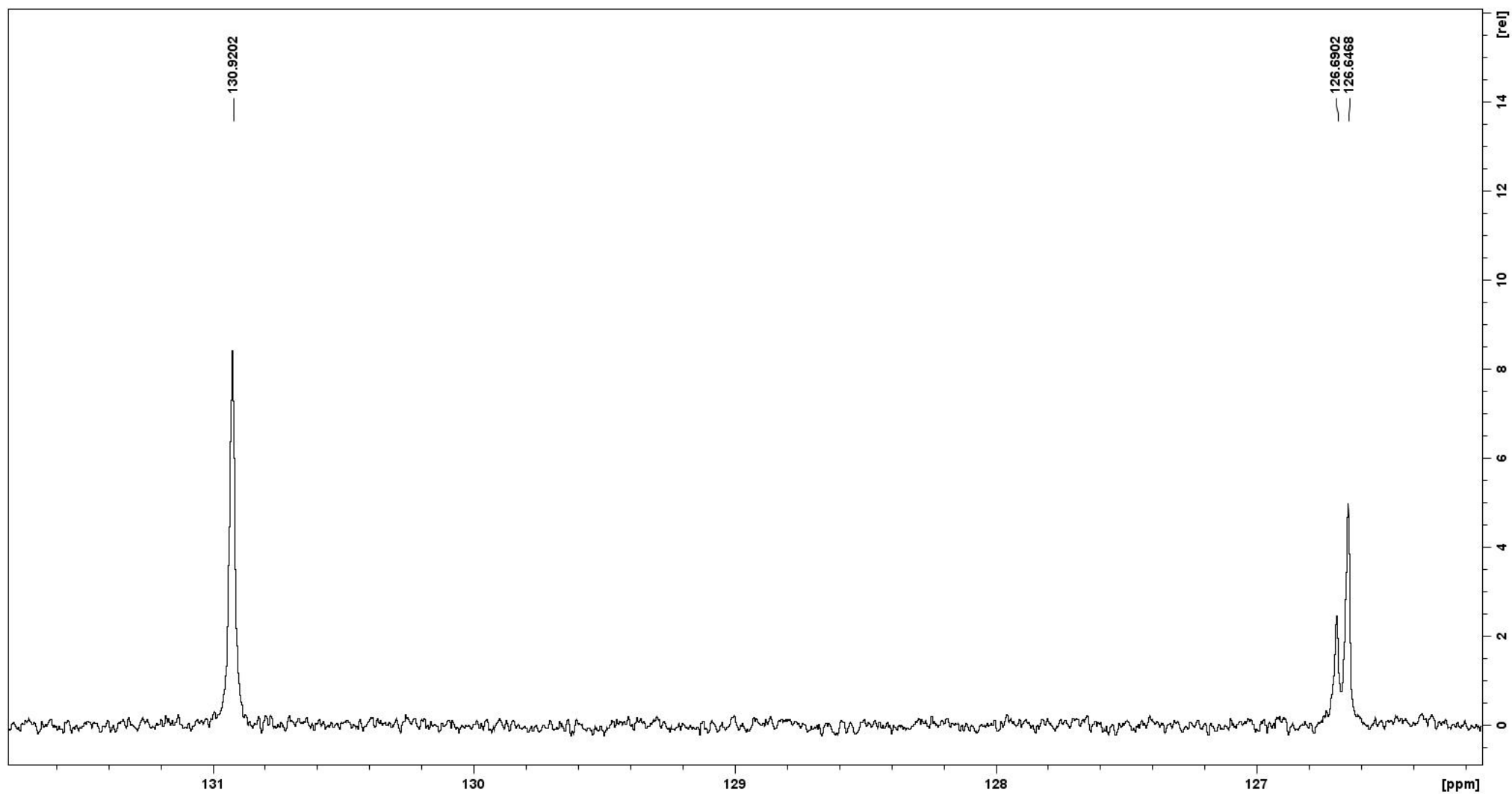
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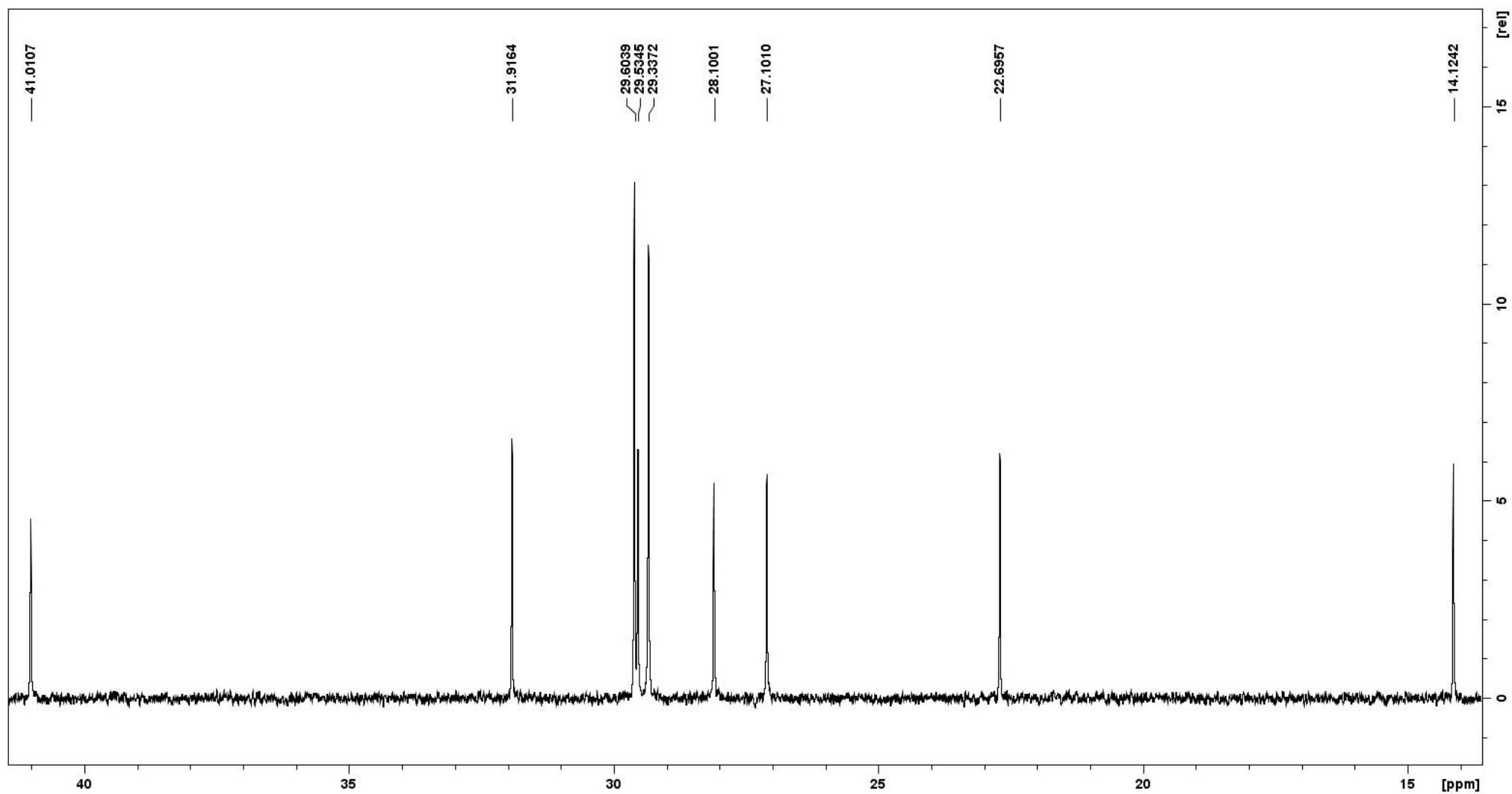
Expanded aliphatic region of ^1H NMR spectrum of NDIC11



$^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC11 (CDCl_3 , 151 MHz)



Expanded aromatic region of $^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC11



Expanded aliphatic region of $^{13}\text{C}\{^1\text{H}\}$ NMR spectrum of NDIC11