Supporting Information

Synthesis and stereospecificity of 4,5-disubstituted oxazolidinone ligands binding to T-box riboswitch RNA

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Binding isotherms for oxazolidinones

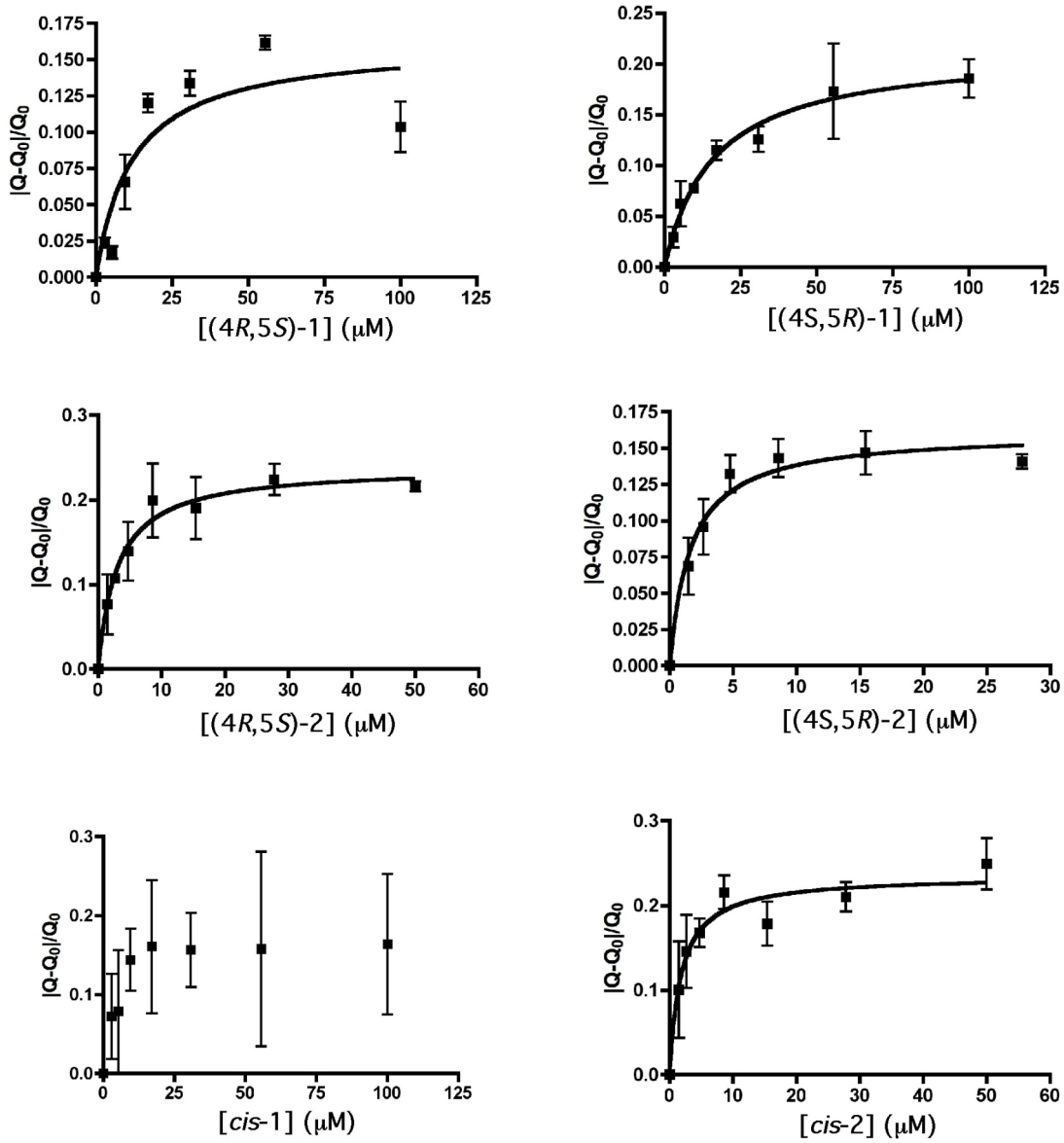


Figure 1. Binding isotherms for oxazolidinones. Please see Experimental Section for details and Table 1 for K_d values.

In-line probing of AM1A binding with (4*R*,5*S*)-1 and (4*S*,5*R*)-1

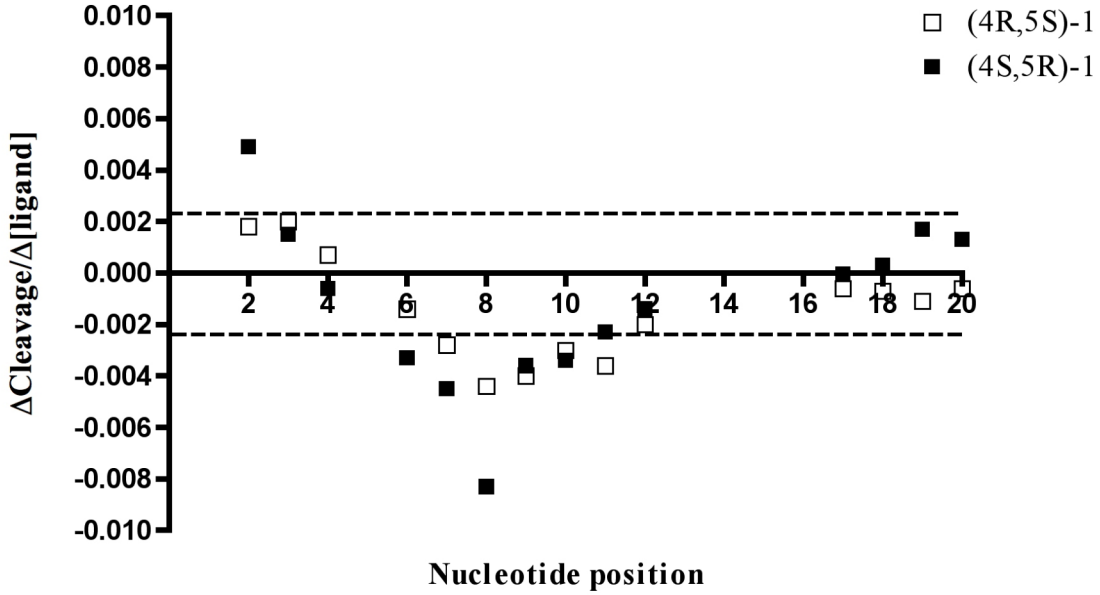


Figure 2. Summary of in-line probing data for AM1A in the presence of (4*R*,5*S*)-**1** and (4*S*,5*R*)-**1**. Please see Experimental Section for details. Negative slope values indicate the inline cleavage decreased with increasing concentration of ligand, while positive slope values indicate that the inline cleavage increased with increasing concentration of ligand. Dashed lines represent the average of the absolute value of all calculated slopes. Data appearing beyond this value is considered to represent more significant ligand-induced cleavage changes.

In-line probing of AM1A binding with (4*R*,5*S*)-2 and (4*S*,5*R*)-2

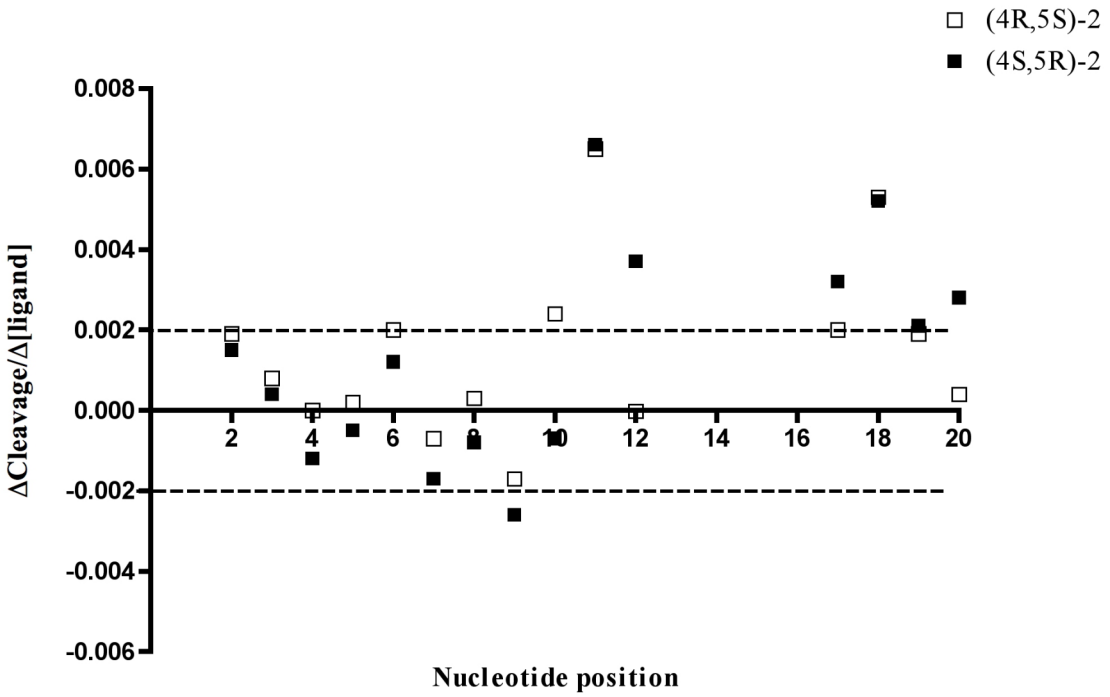


Figure 3. Summary of in-line probing data for AM1A in the presence of (4*R*,5*S*)-**2** and (4*S*,5*R*)-**2**. Please see Experimental Section for details. Negative slope values indicate the in-line cleavage decreased with increasing concentration of ligand, while positive slope values indicate that the in-line cleavage increased with increasing concentration of ligand. Dashed lines represent the average of the absolute value of all calculated slopes. Data appearing beyond this value is considered to represent more significant ligand-induced cleavage changes.

Mosher ester of (*R*)-8

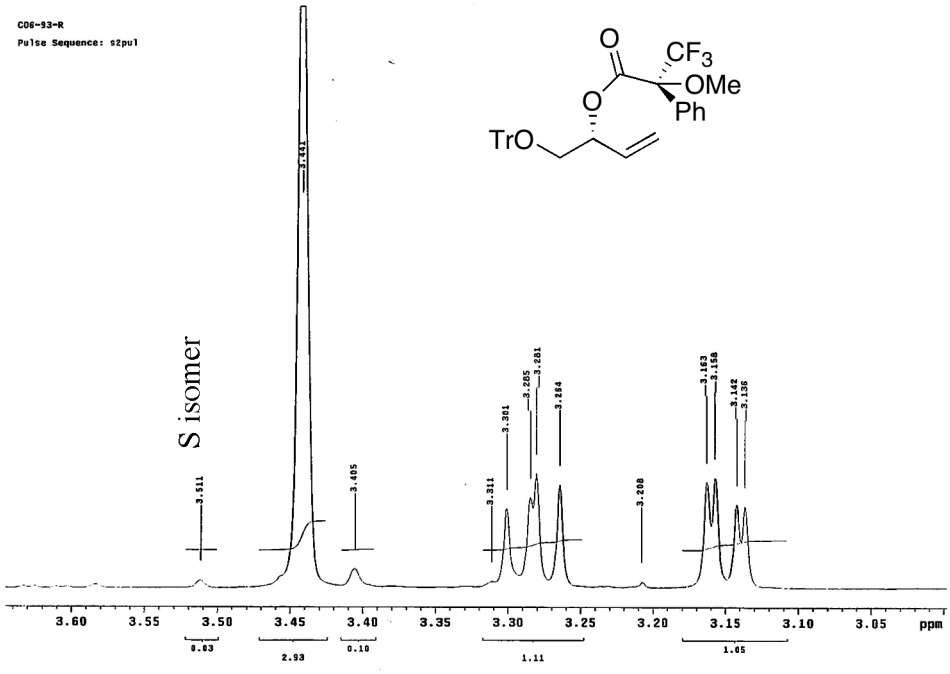


Figure 4. Expanded ^{1}H NMR spectrum of Mosher ester derived from (*R*)-**8**.

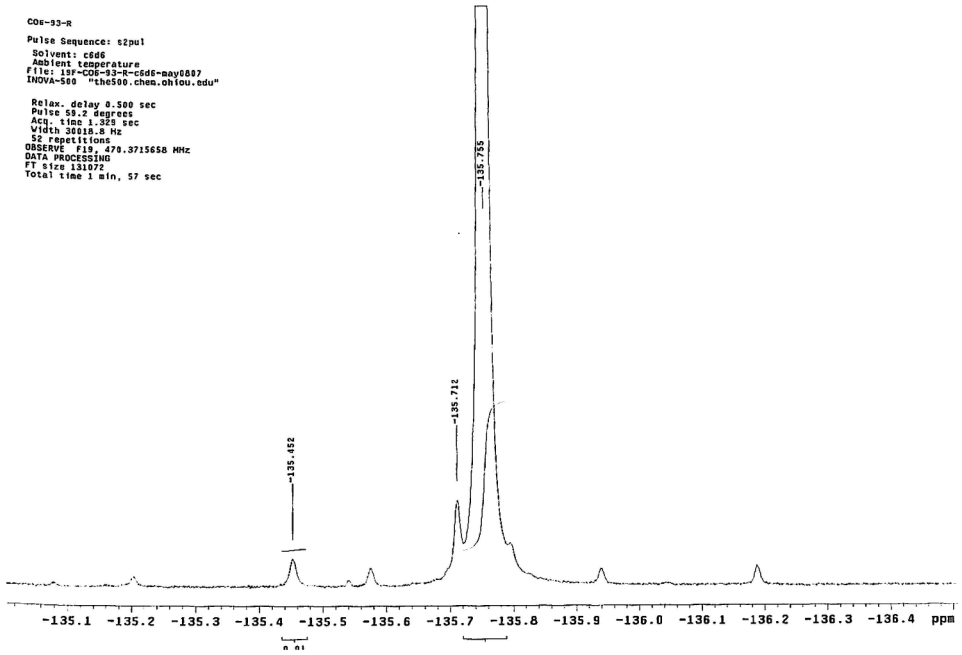


Figure 5. ^{19}F NMR spectrum of Mosher ester derived from (*R*)-**8**.

Mosher ester of (*S*)-8

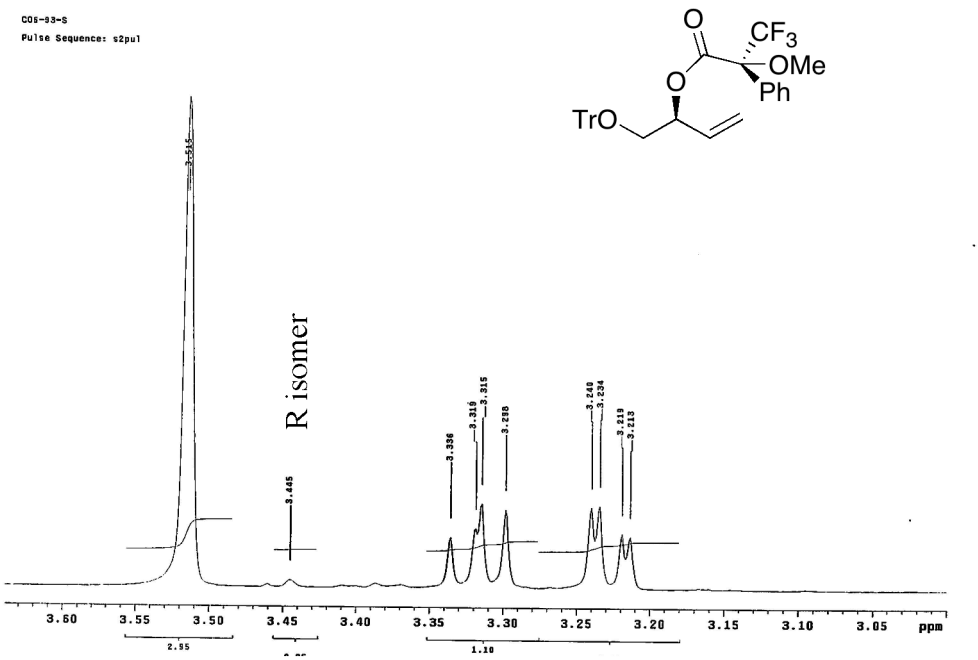


Figure 6. Expanded ^{1}H NMR spectrum of Mosher ester derived from (*S*)-**8**.

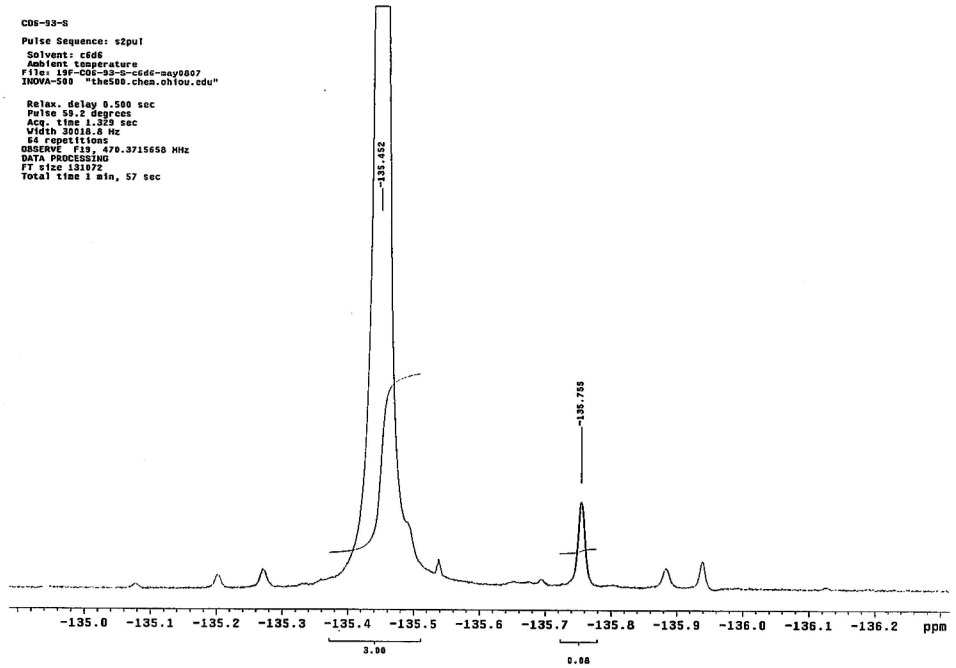
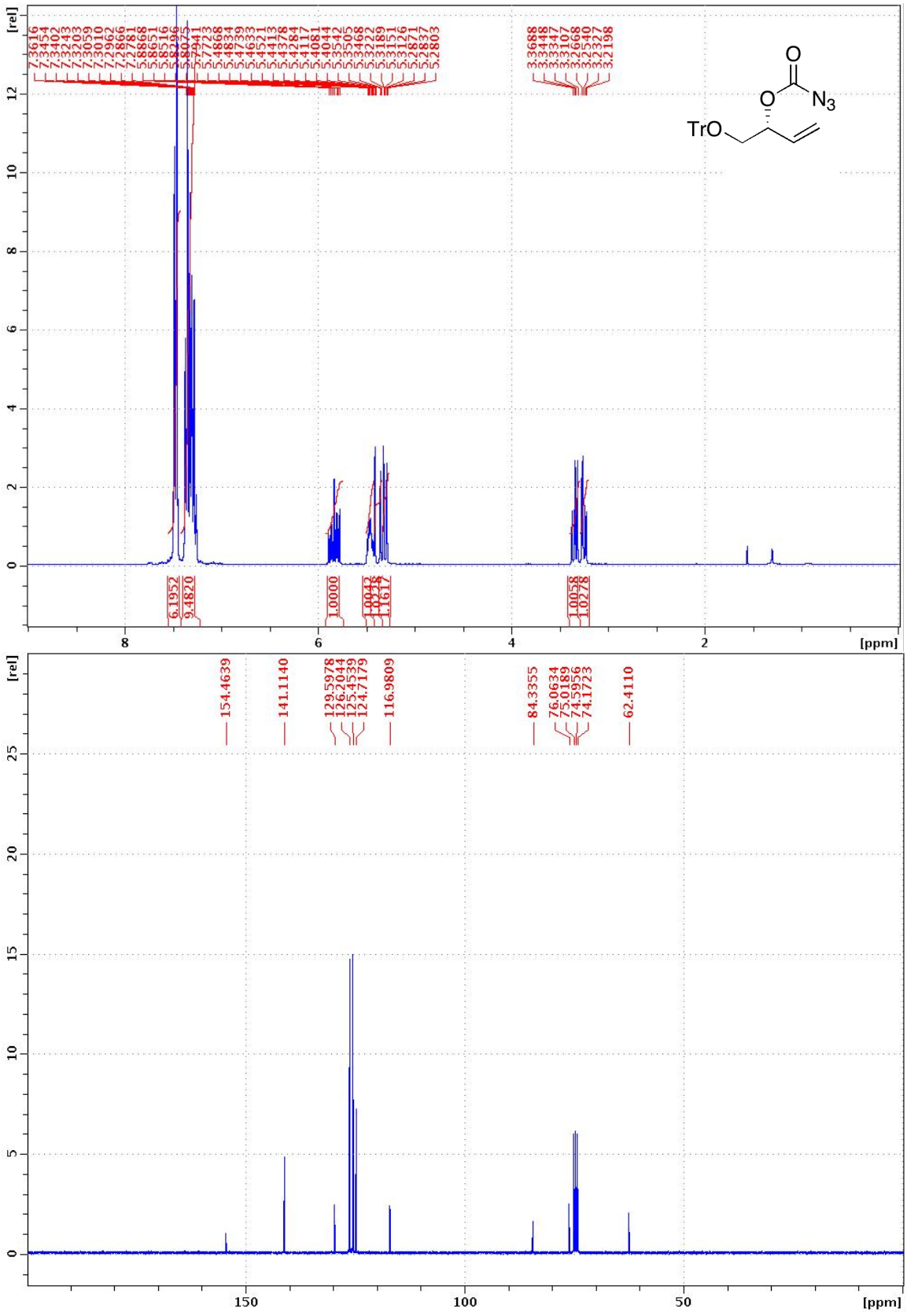
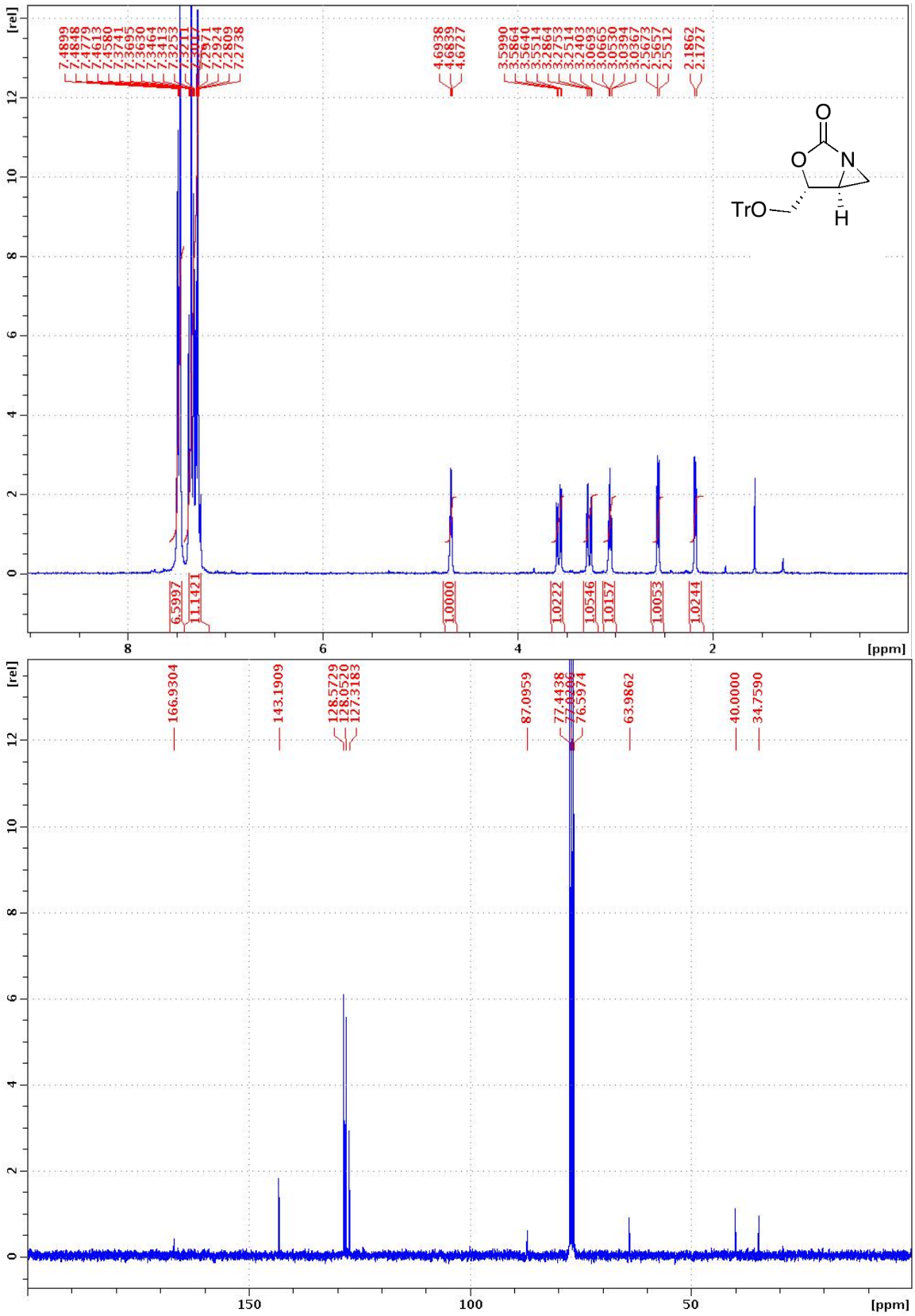


Figure 7. ^{19}F NMR spectrum of Mosher ester derived from (*S*)-**8**.

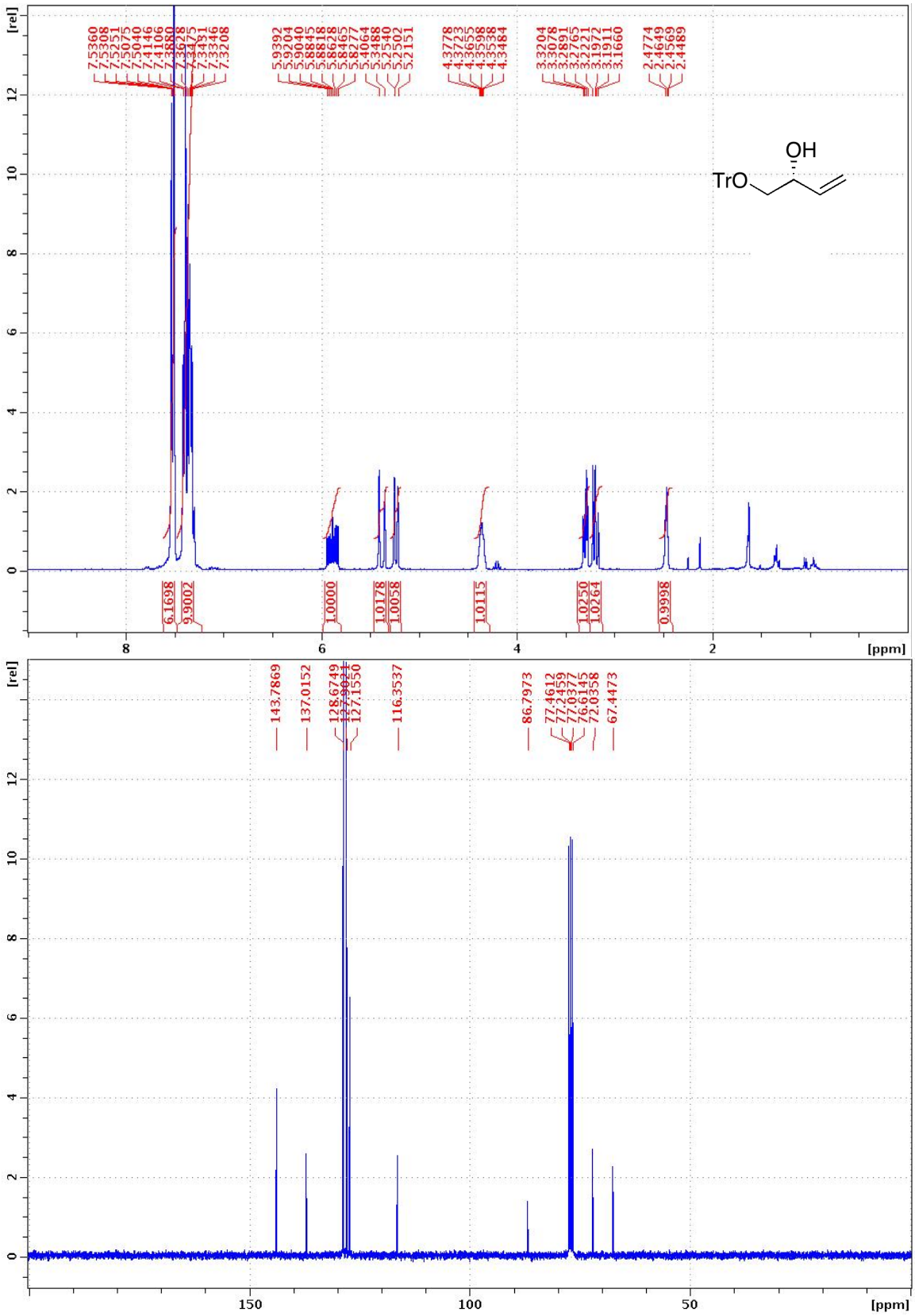
NMR spectra of (*R*)-3



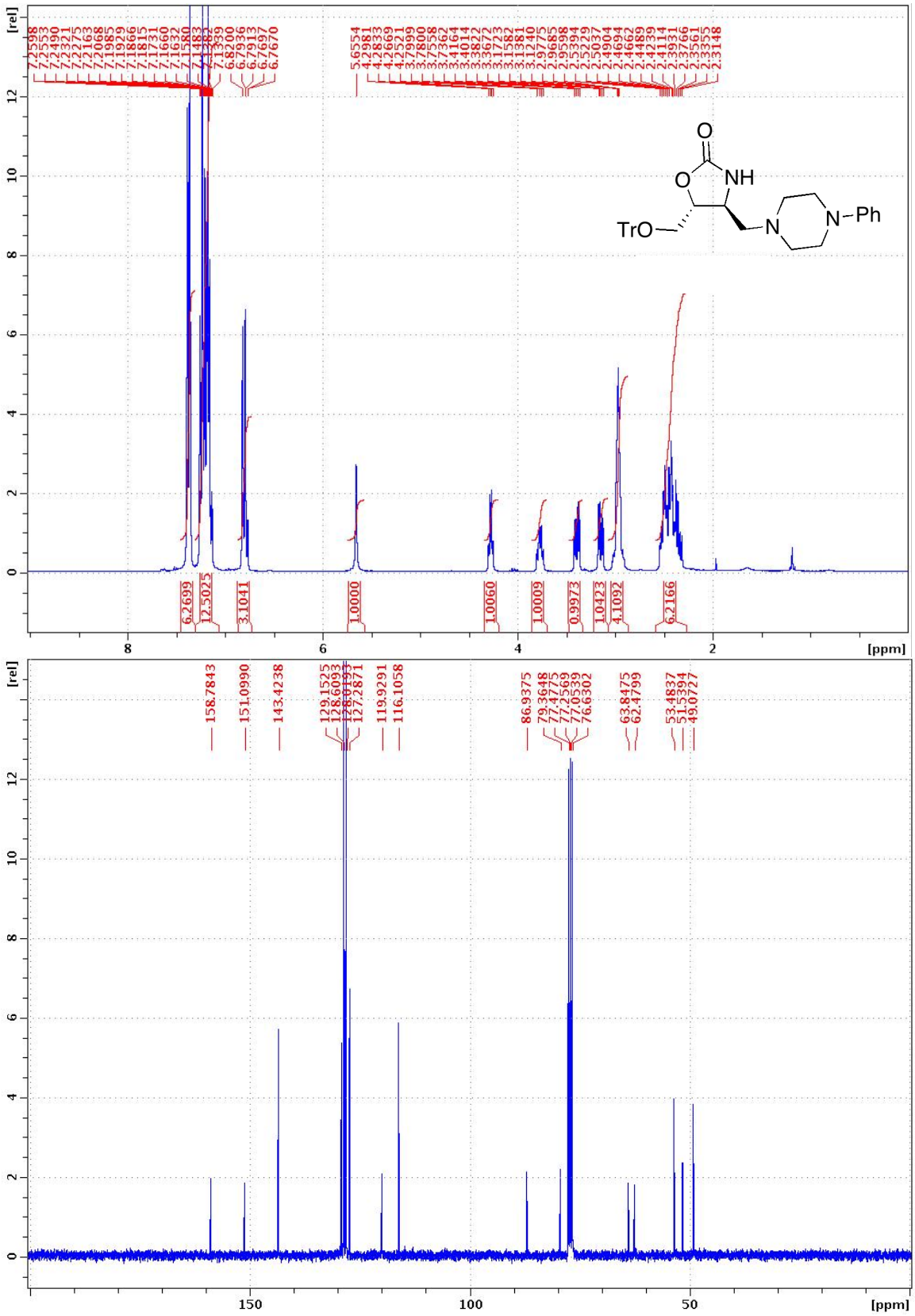
NMR spectra of (*4S*,5*R*)-4



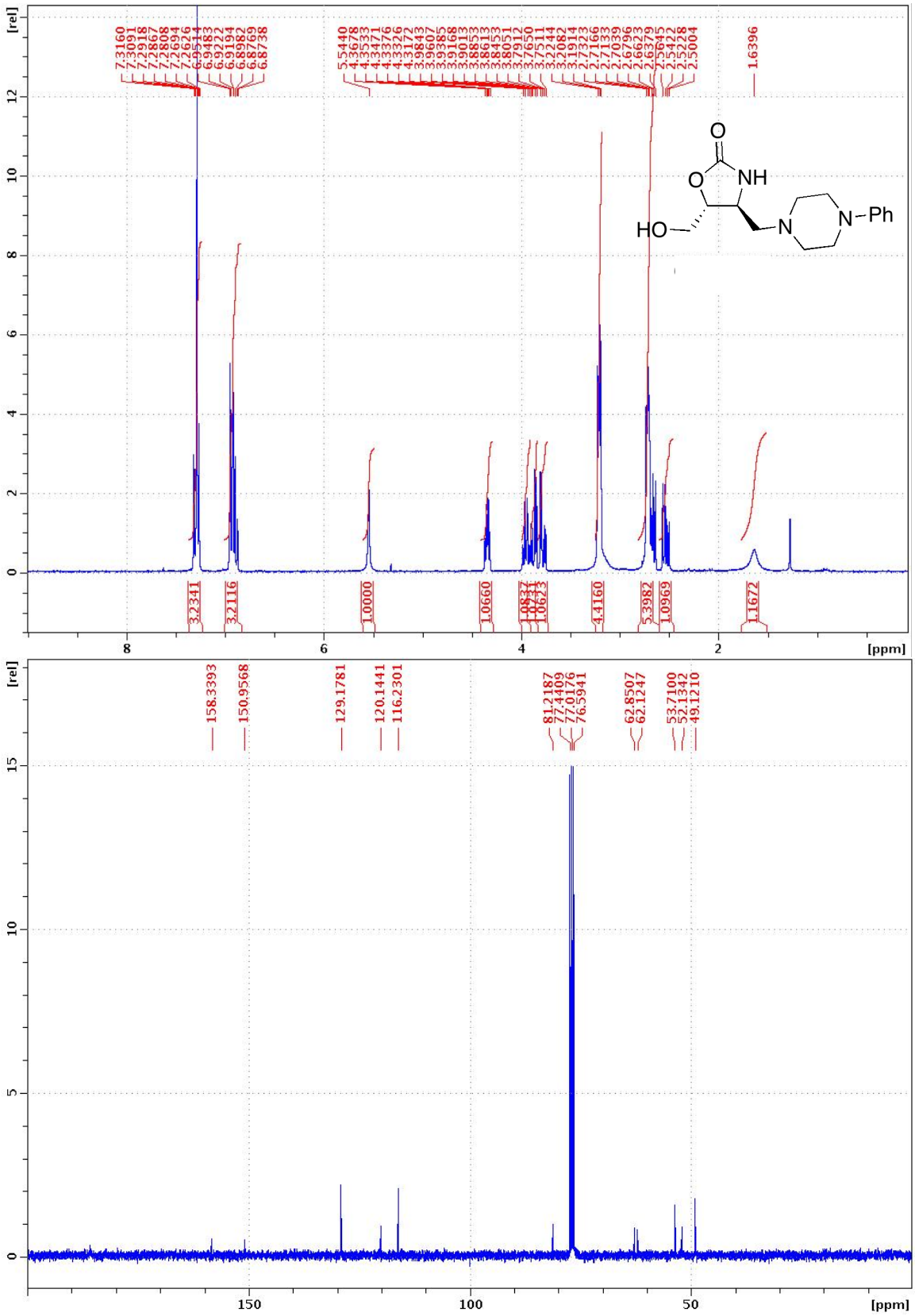
NMR spectra of (*R*)-8



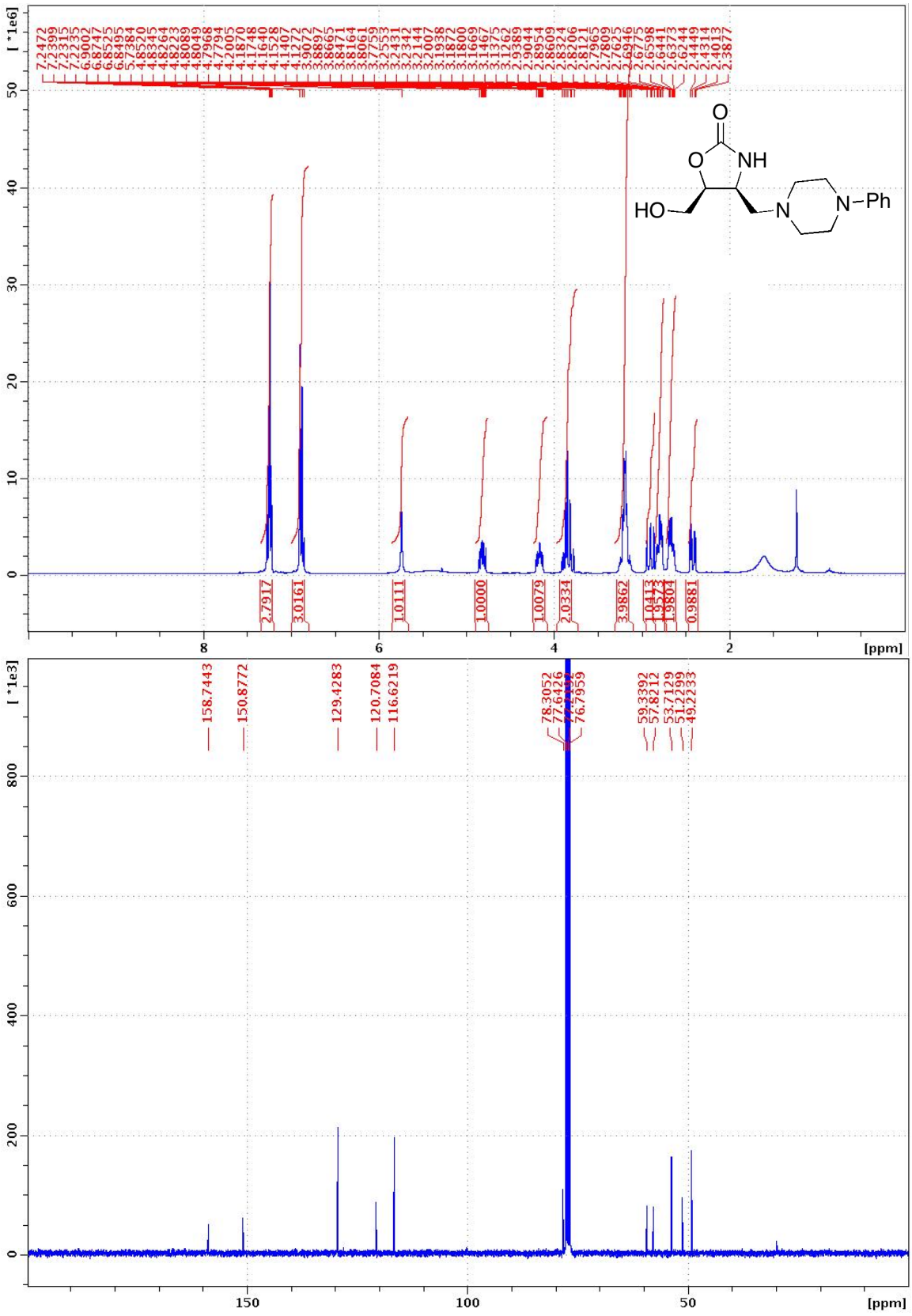
NMR spectra of (*4S*,5*R*)-9



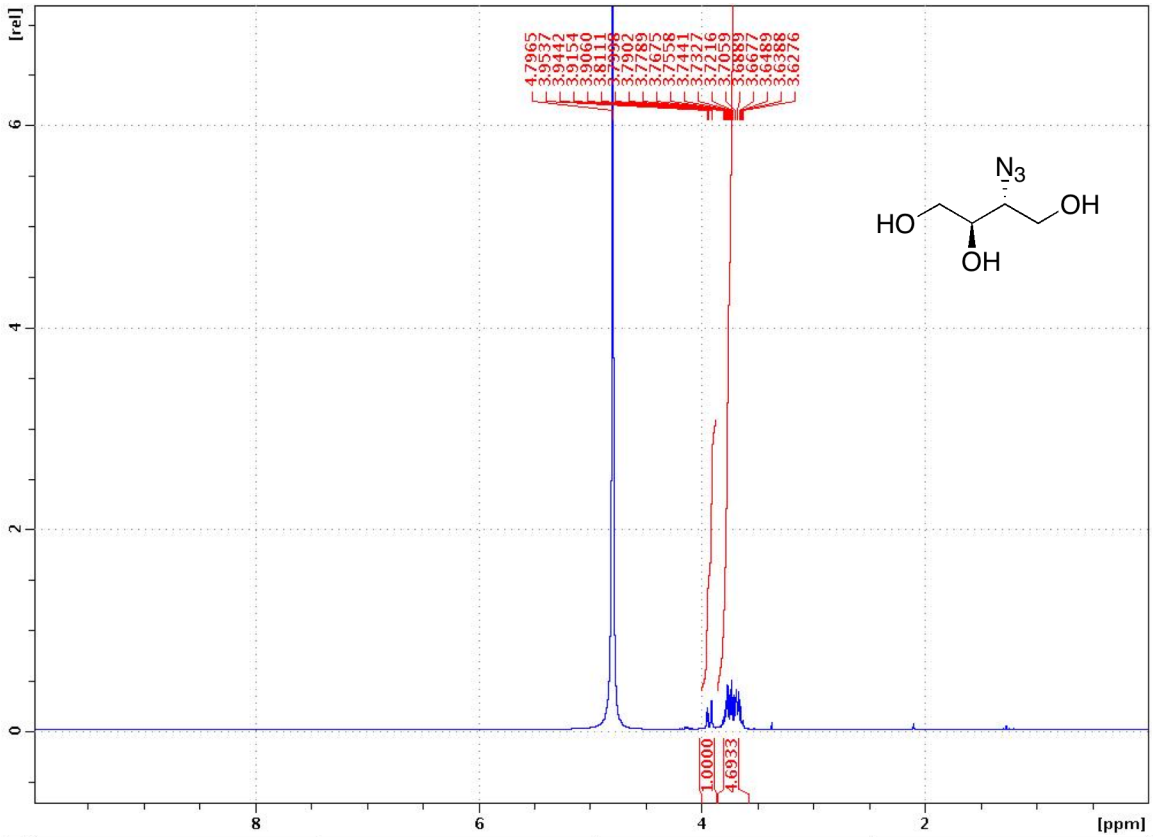
NMR spectra of (*4S*,5*R*)-10

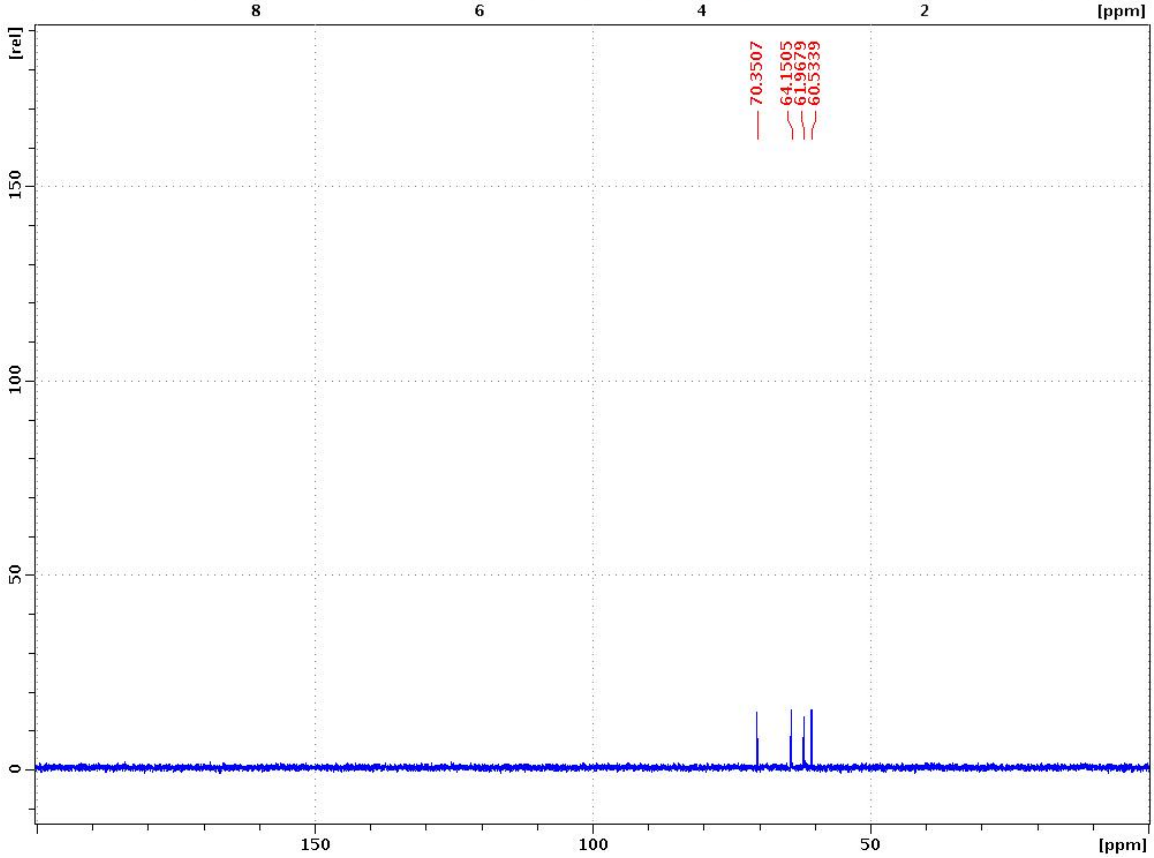


NMR spectra of *cis*-10

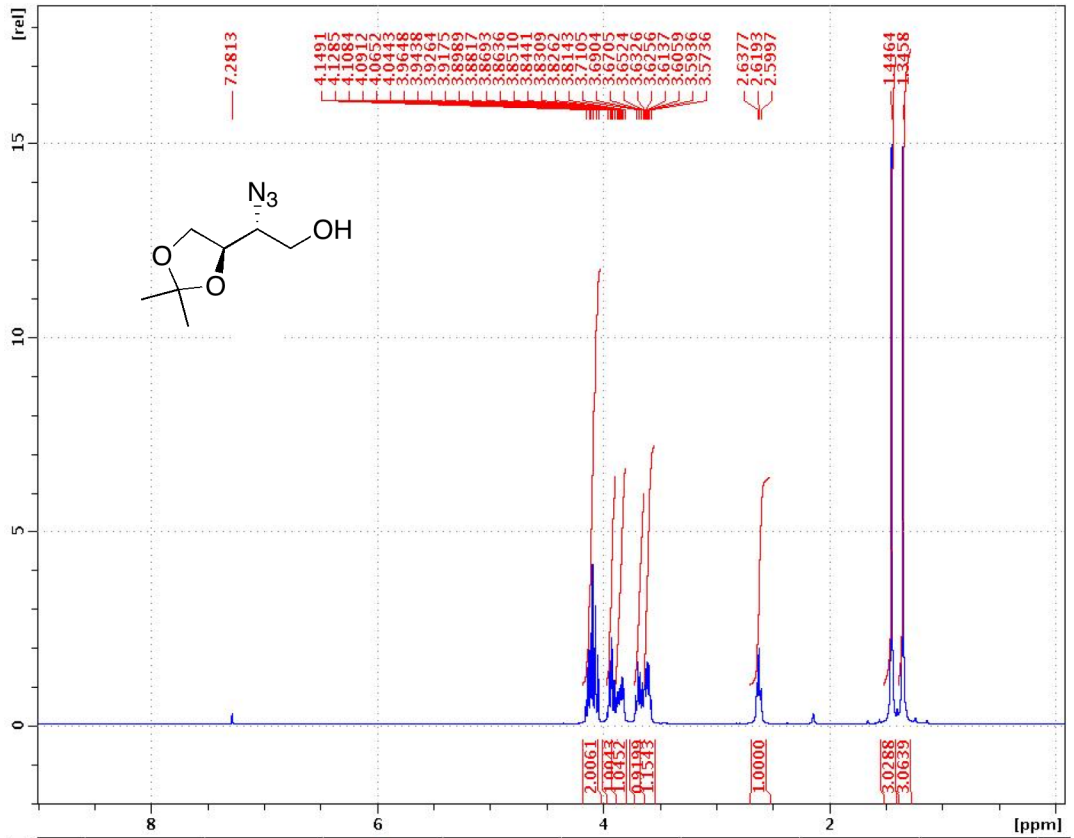


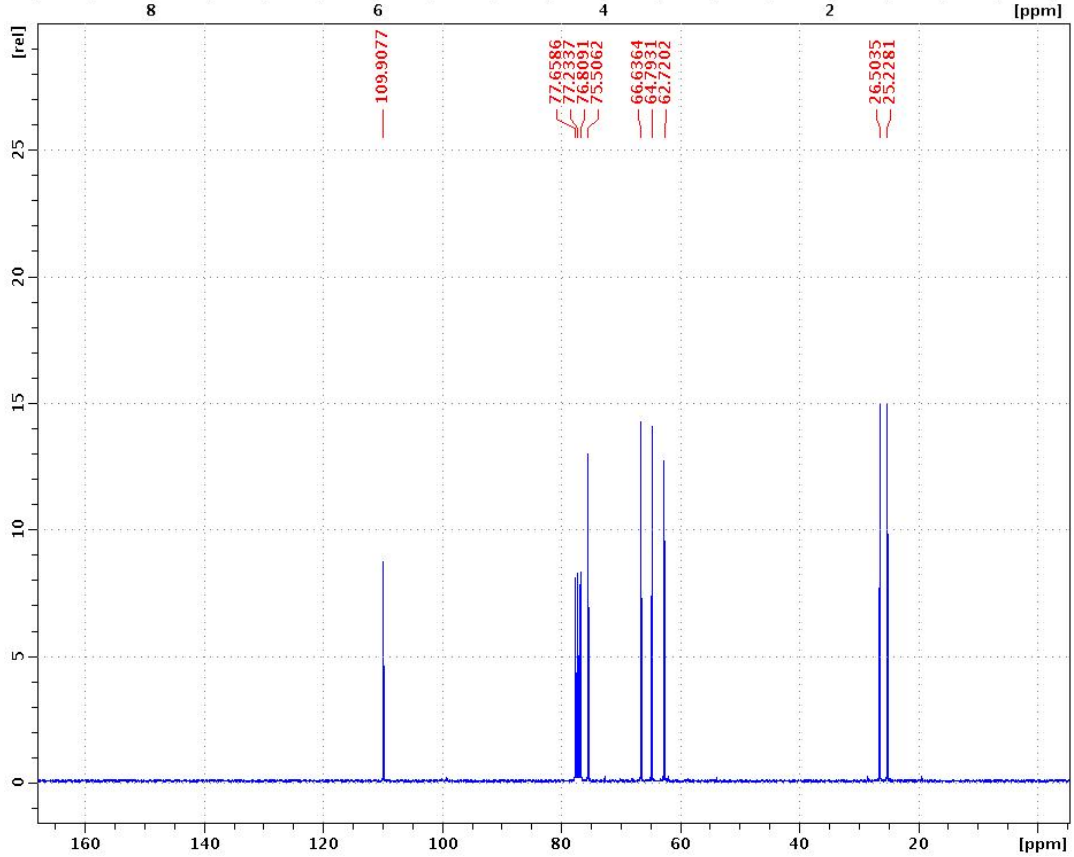
NMR spectra of compound 13



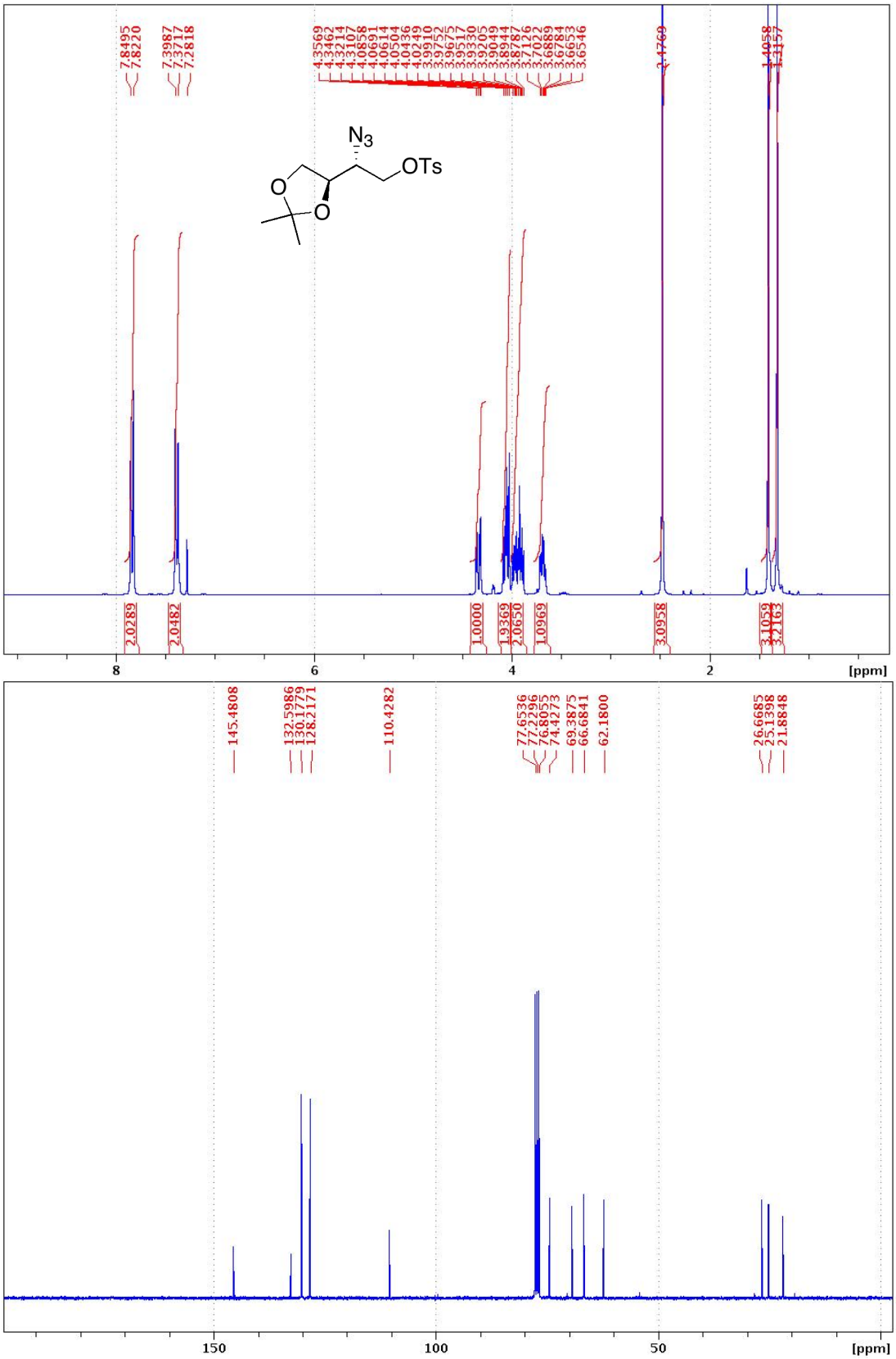


NMR spectra of compound 14

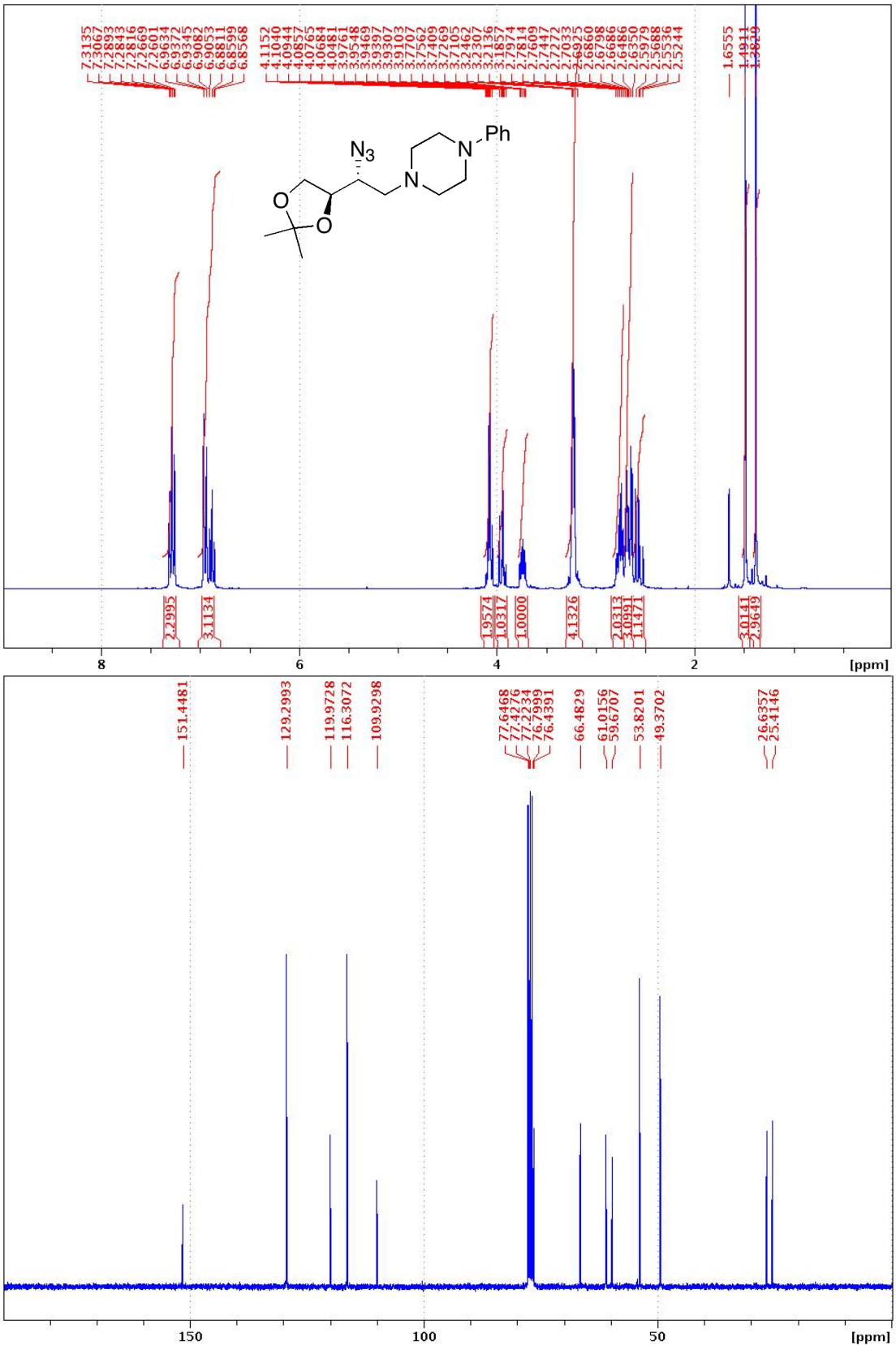




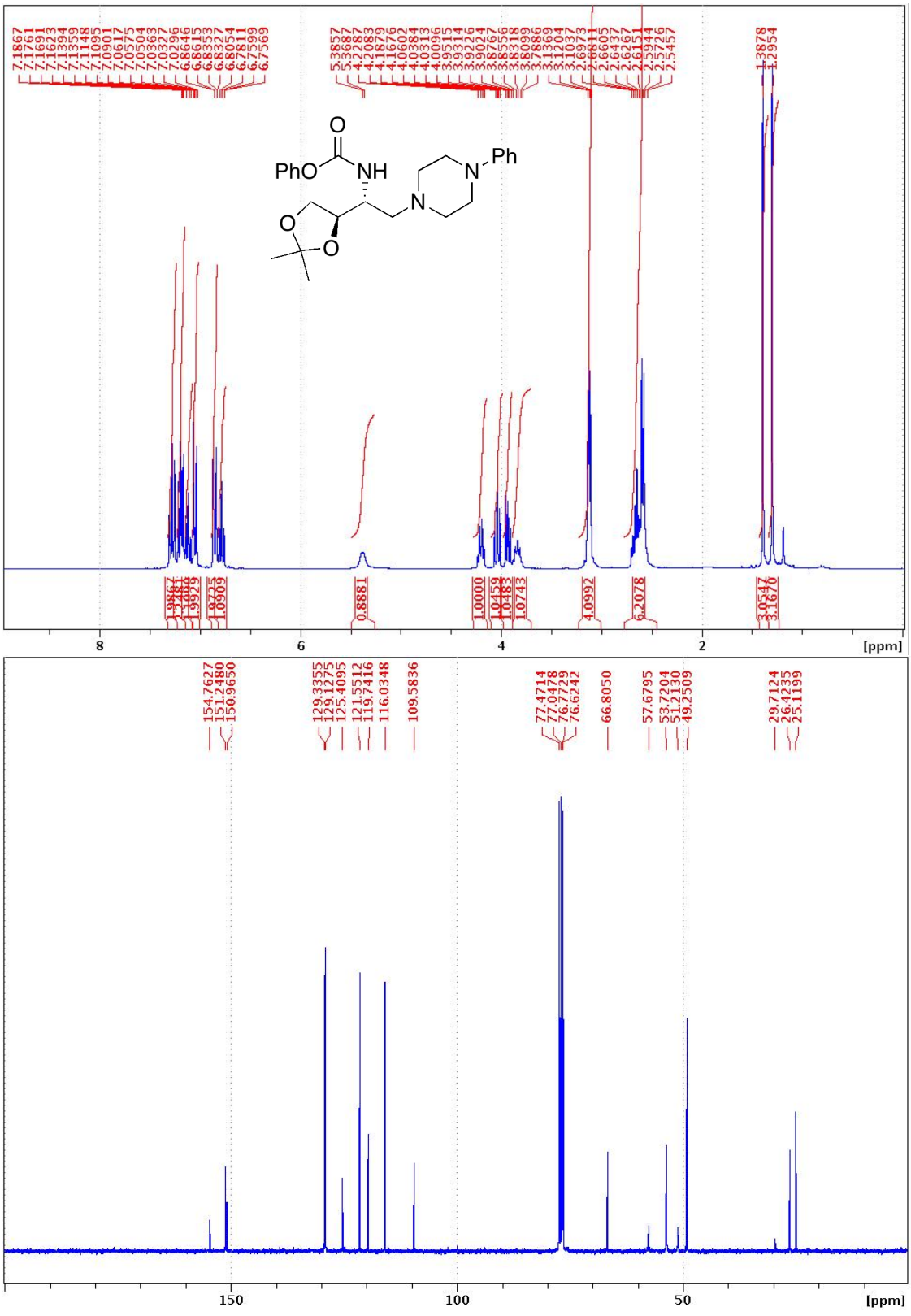
NMR spectra of compound 15



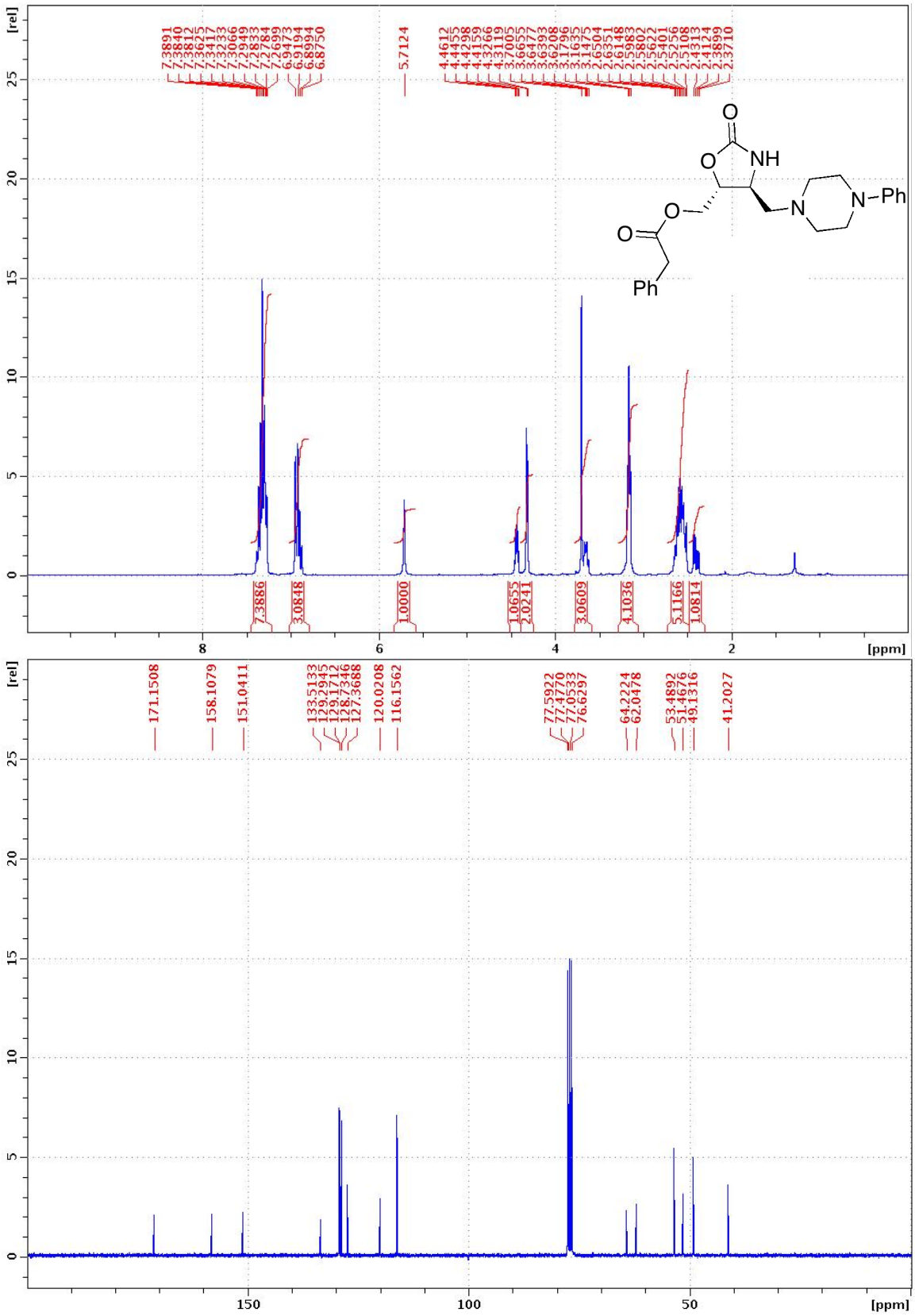
NMR spectra of compound 16



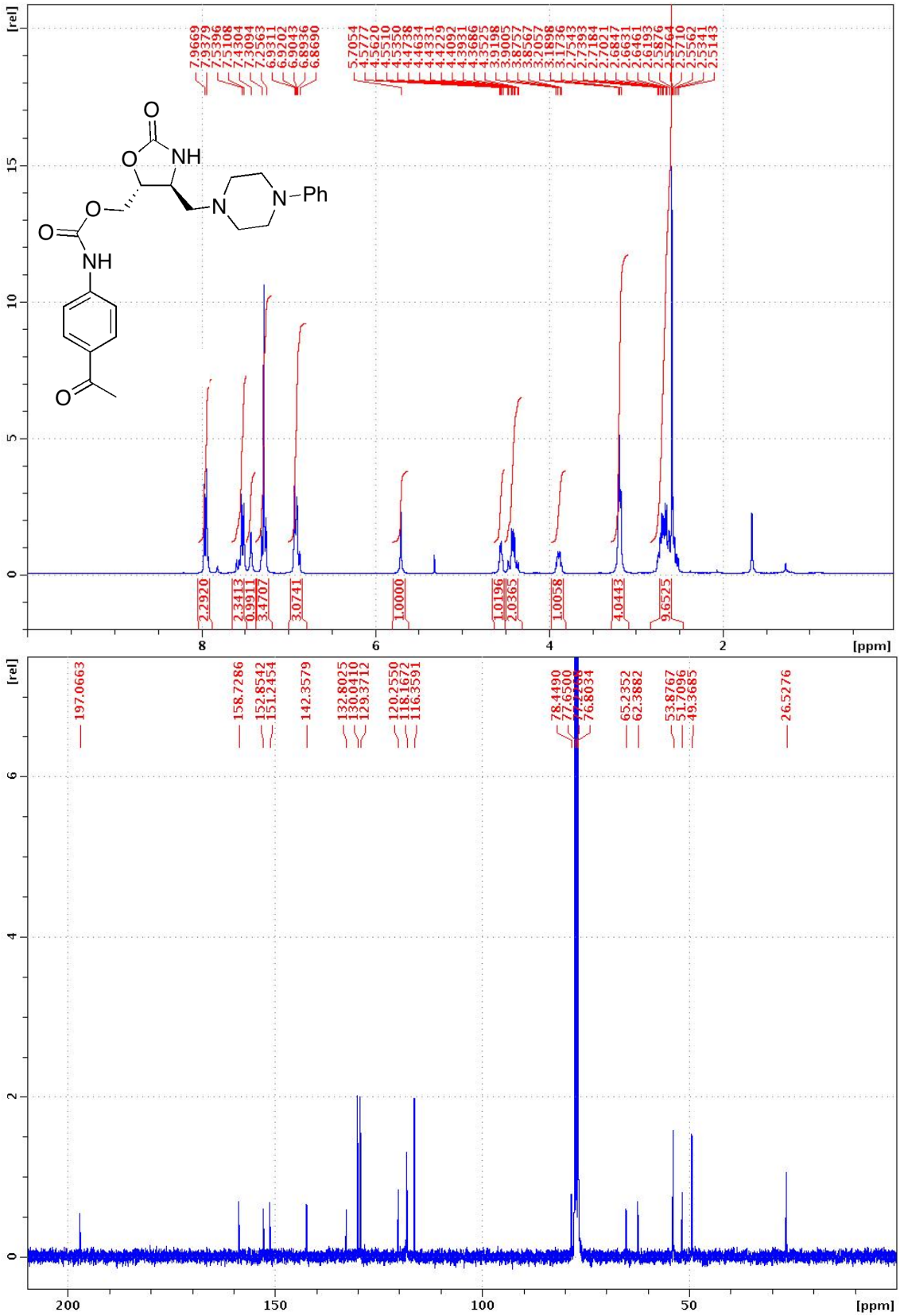
NMR spectra of compound 17



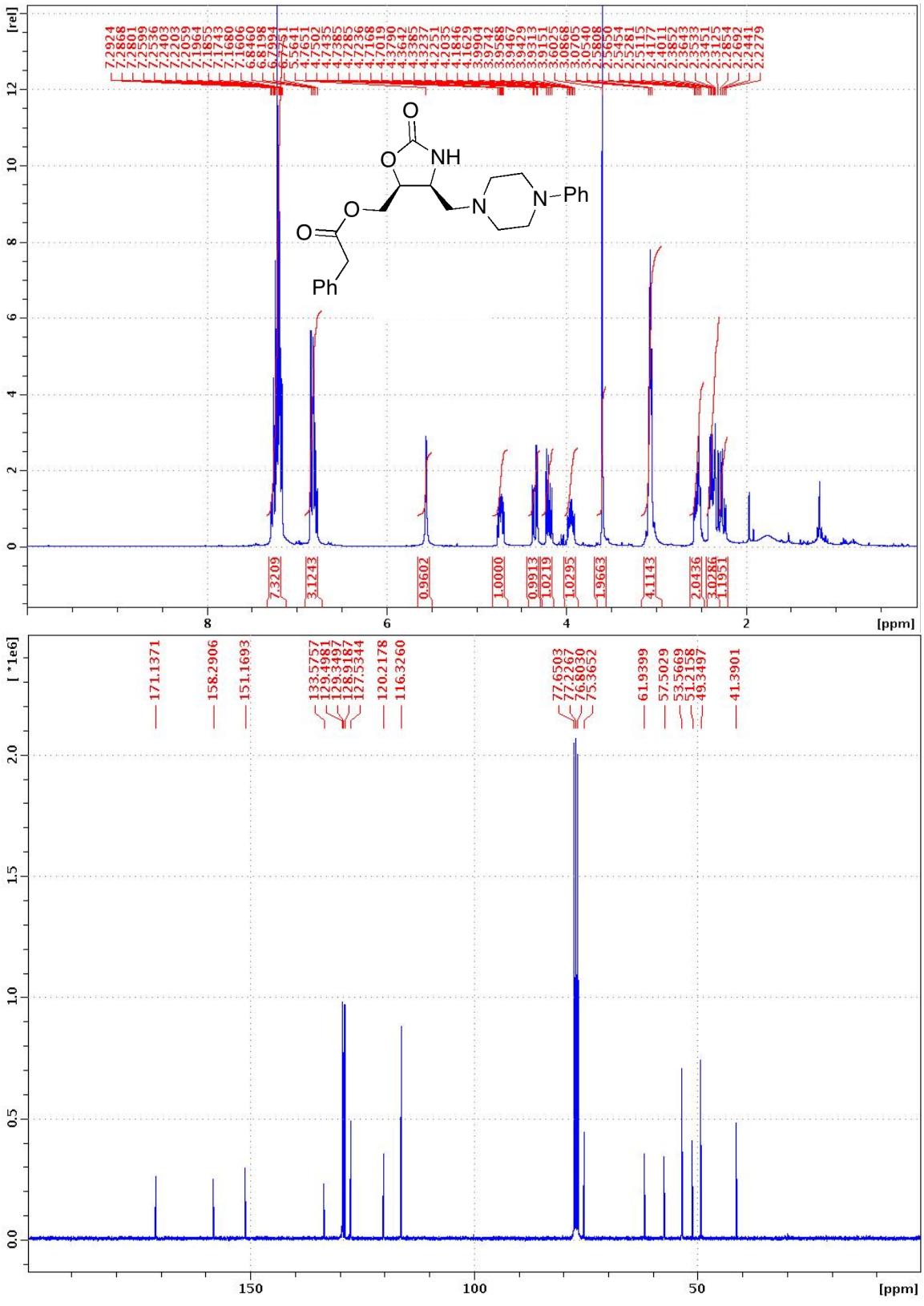
NMR spectra of (4S,5R)-1



NMR spectra of (4S,5R)-2



NMR spectra of *cis*-1



NMR spectra of *cis*-2