

SUPPORTING INFORMATION

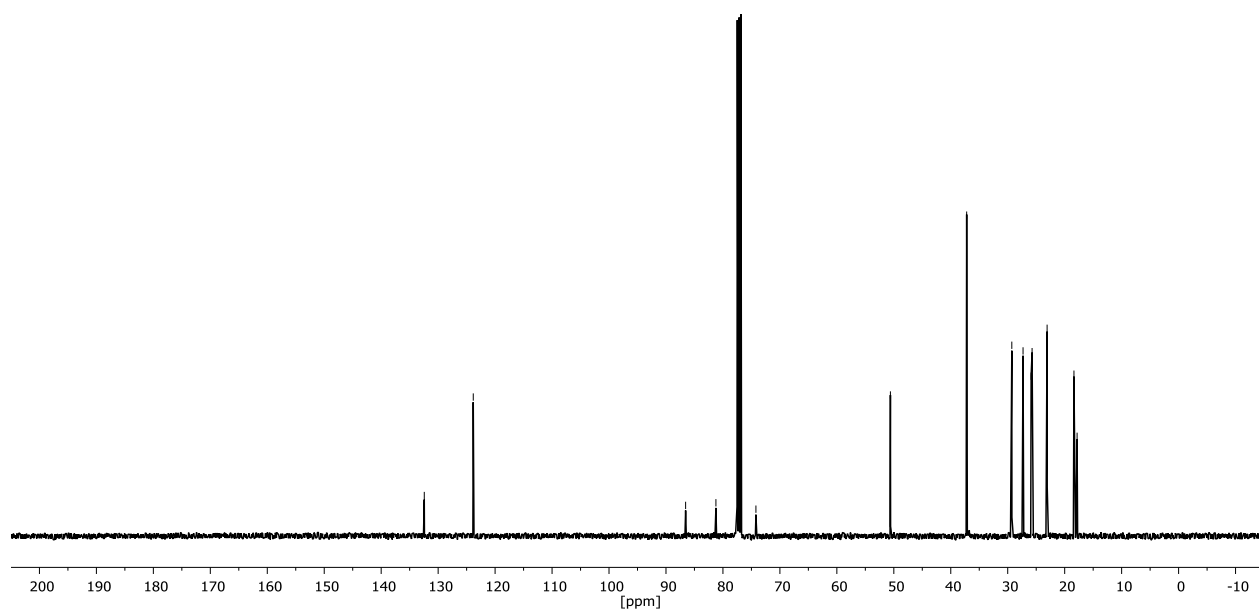
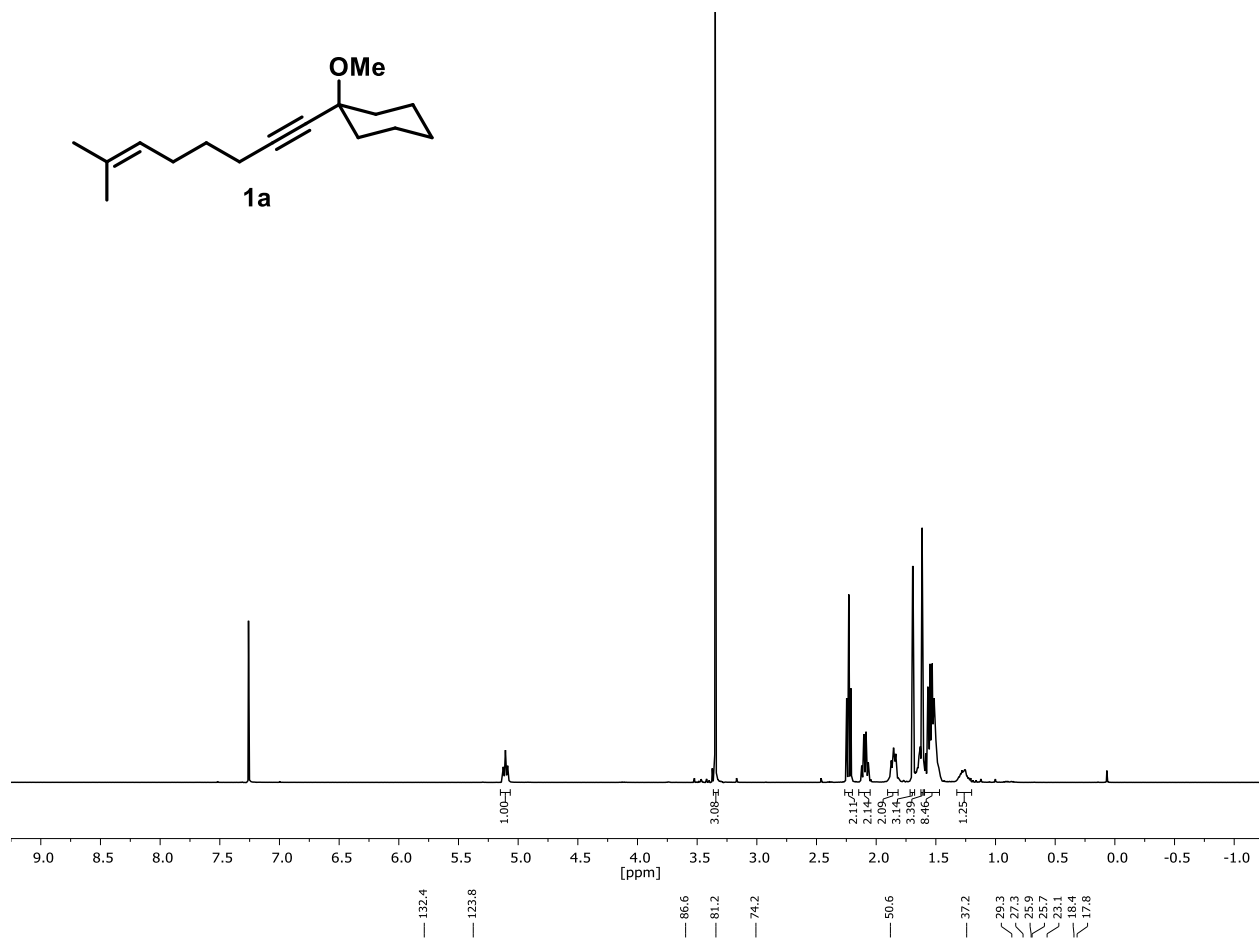
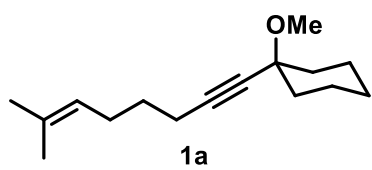
Hydrogenative Metathesis of Enynes via Pianostool Ruthenium Carbene Complexes Formed by Alkyne *gem*-Hydrogenation

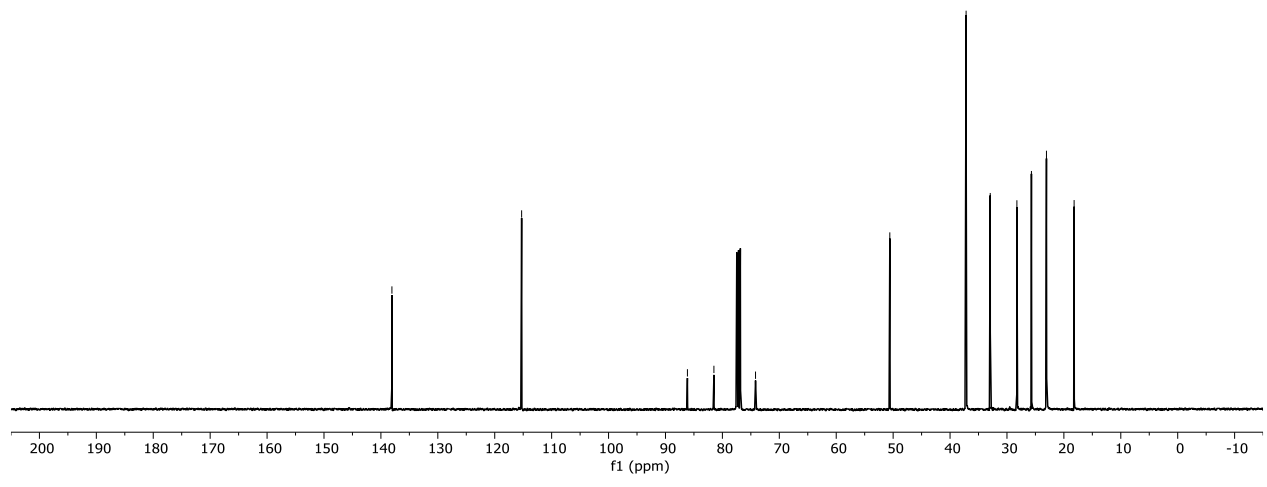
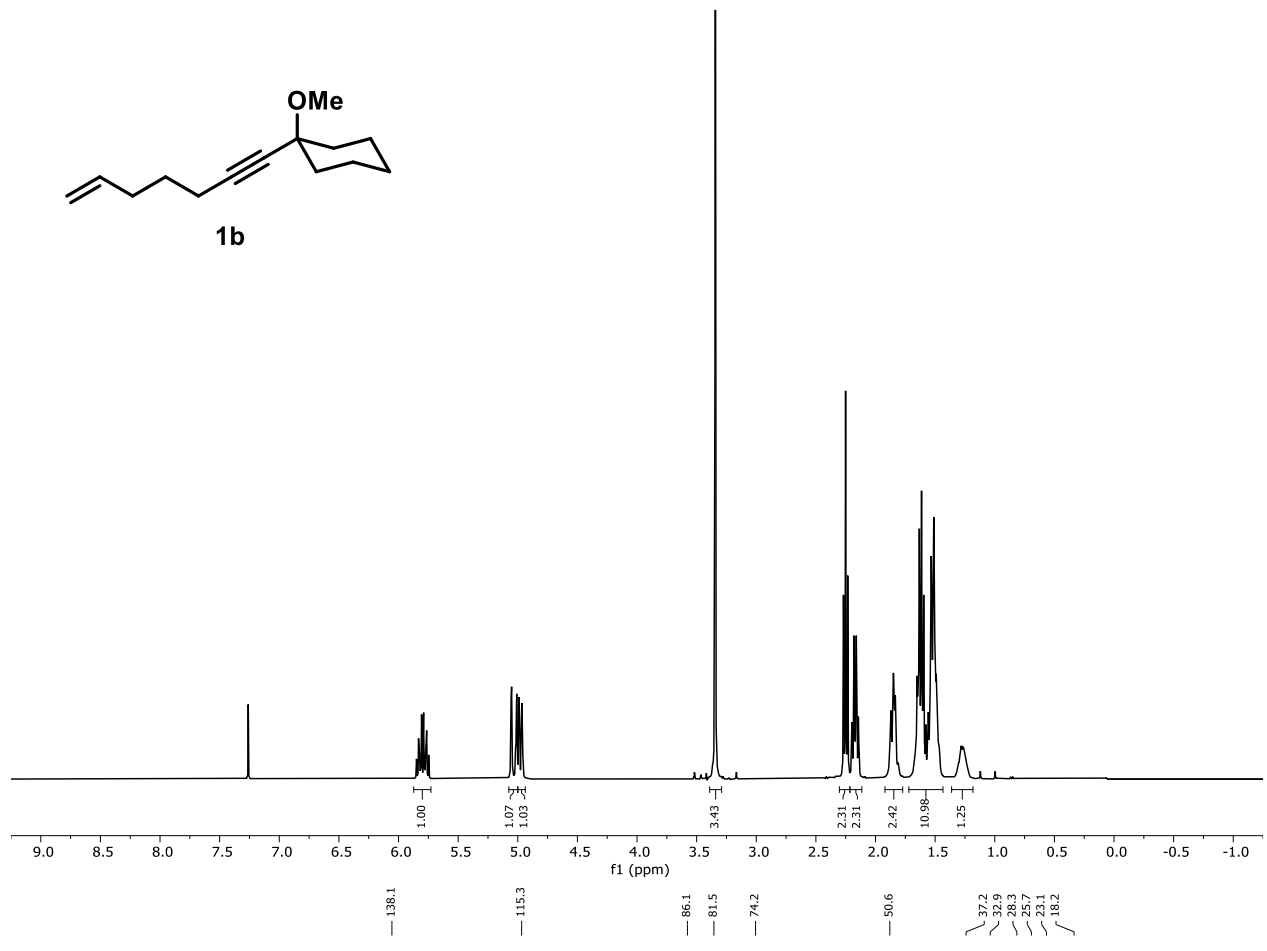
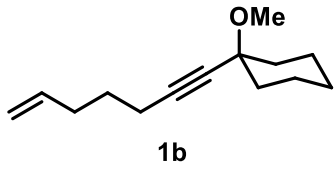
Sebastian Peil, Giovanni Bistoni, Richard Goddard, and Alois Fürstner*

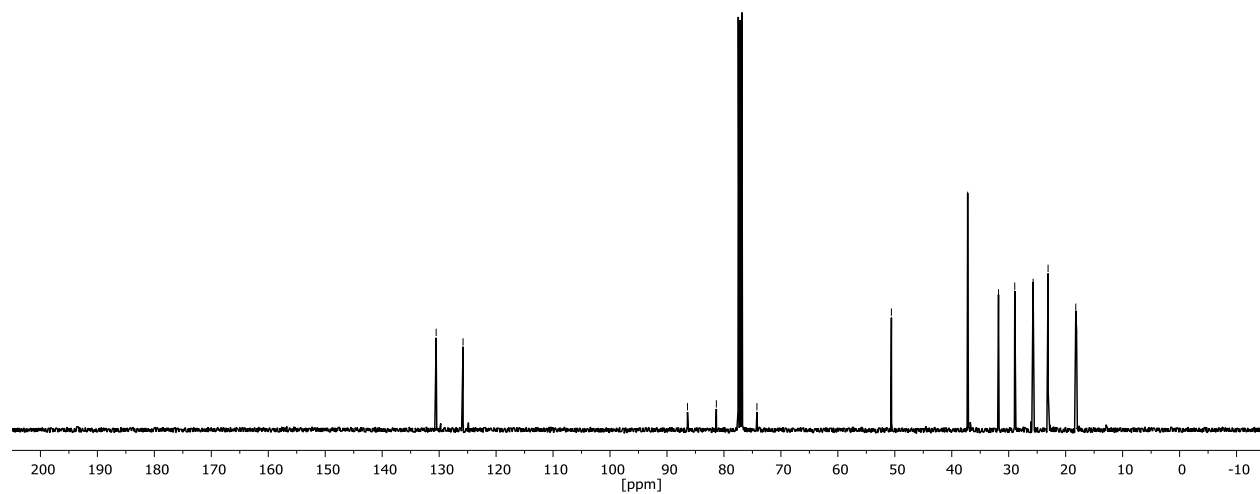
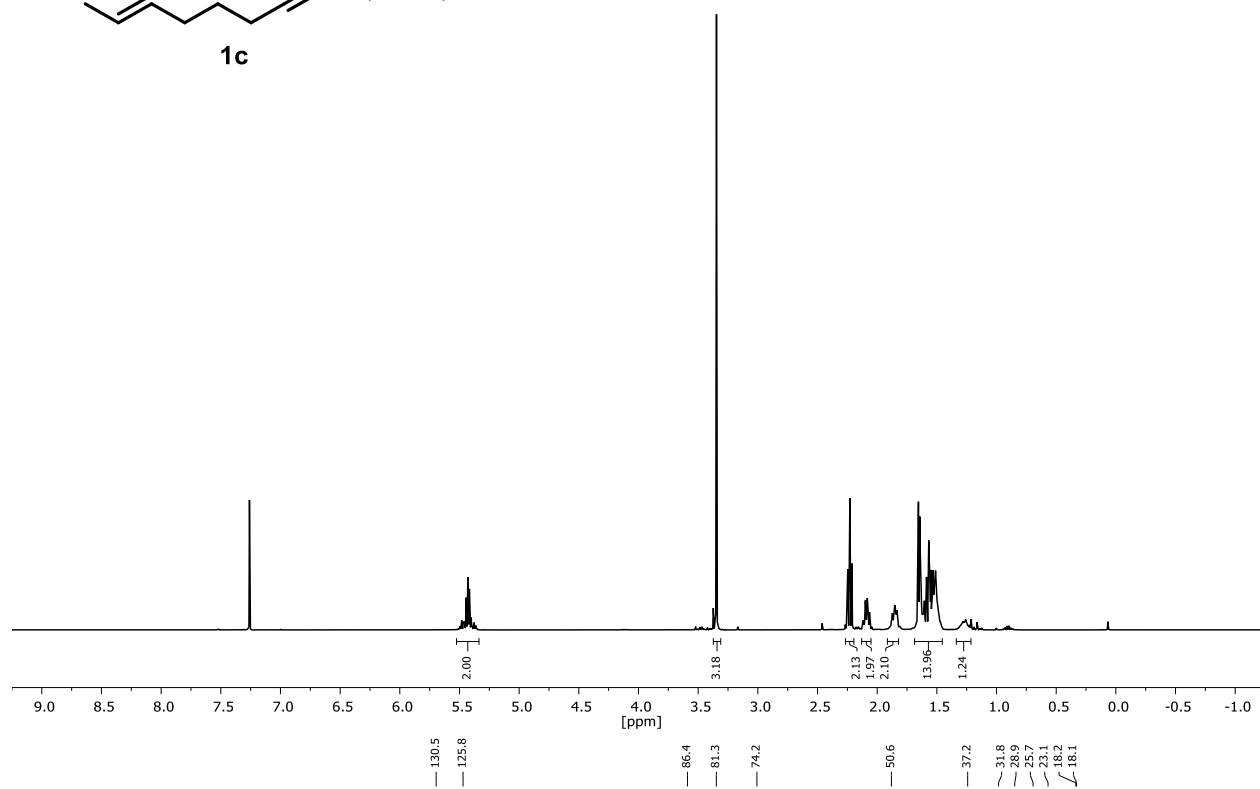
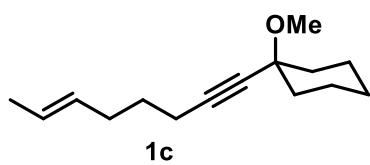
Max-Planck-Institut für Kohlenforschung, 45470 Mülheim/Ruhr (Germany)

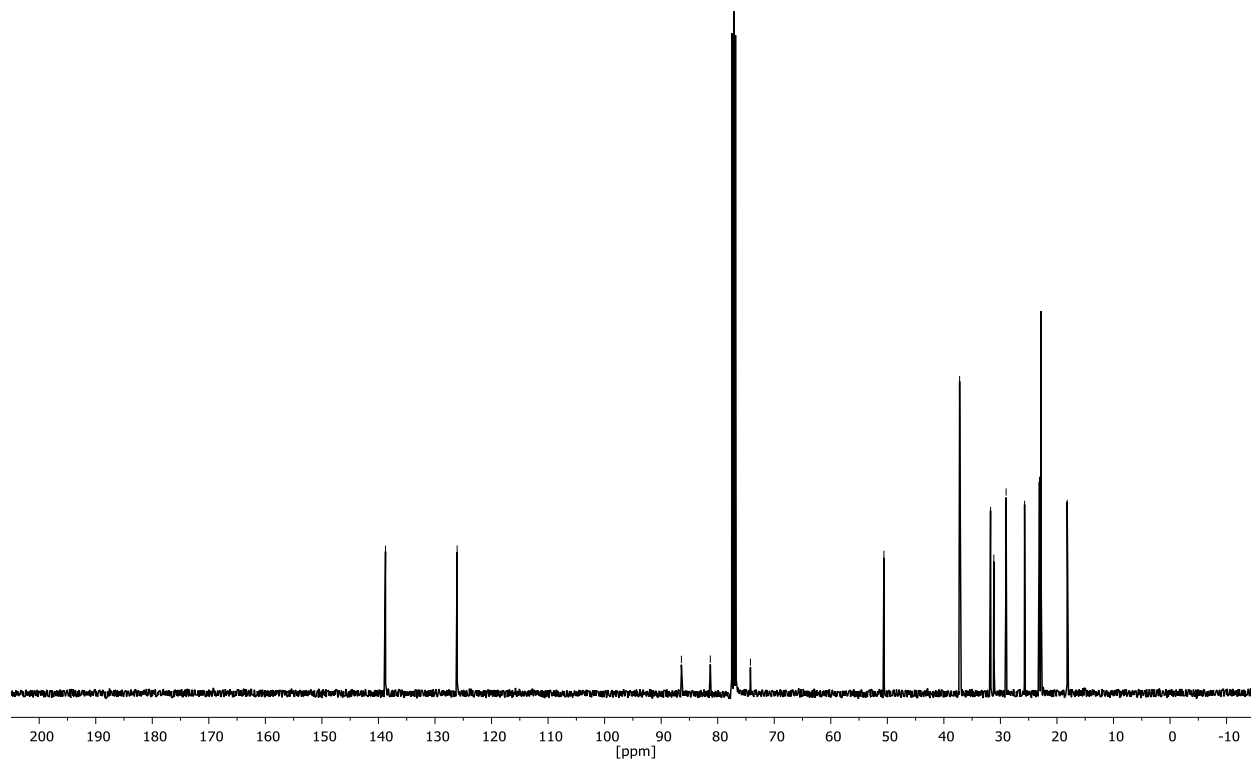
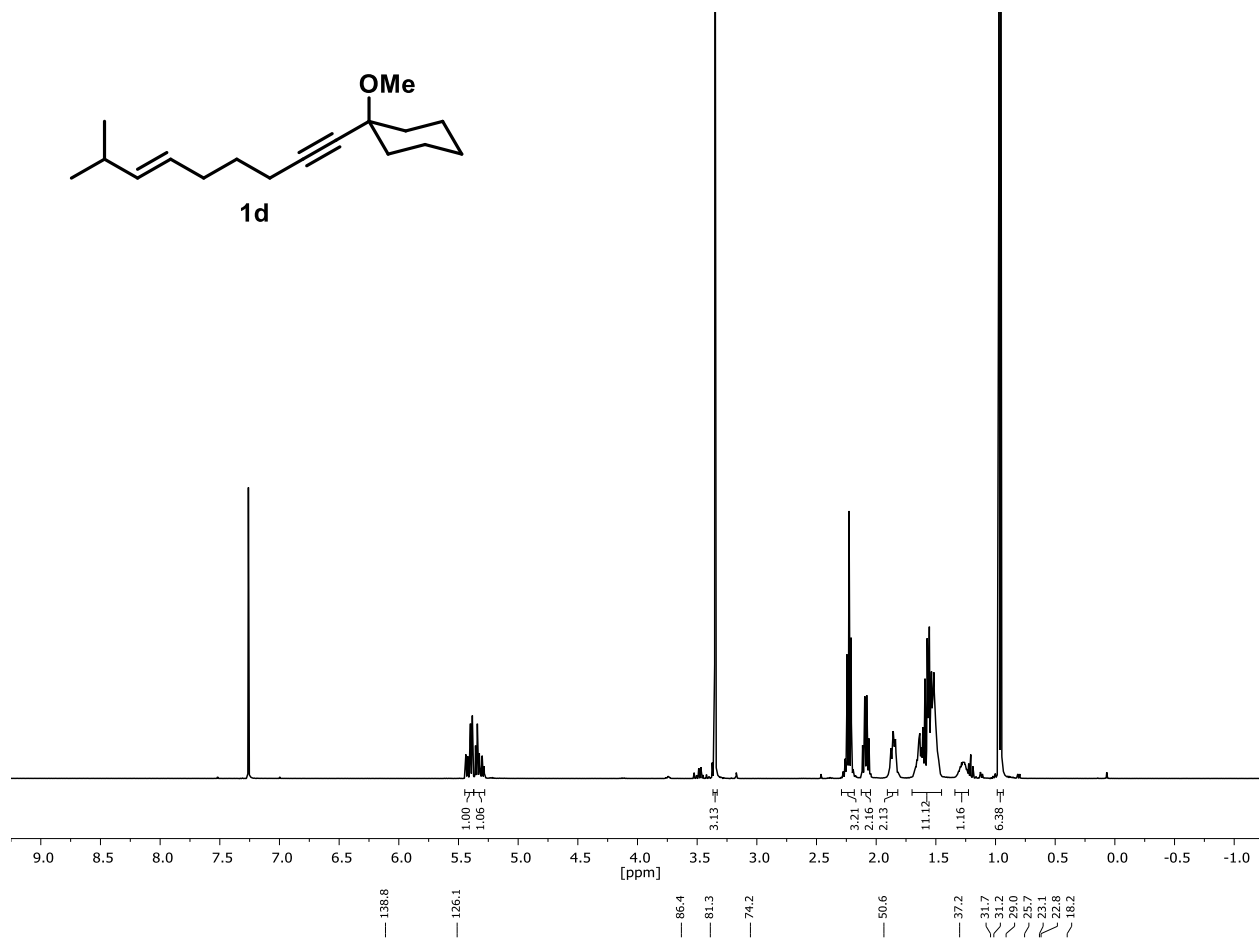
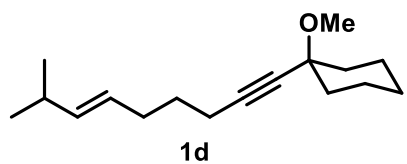
E-Mail: fuerstner@kofo.mpg.de

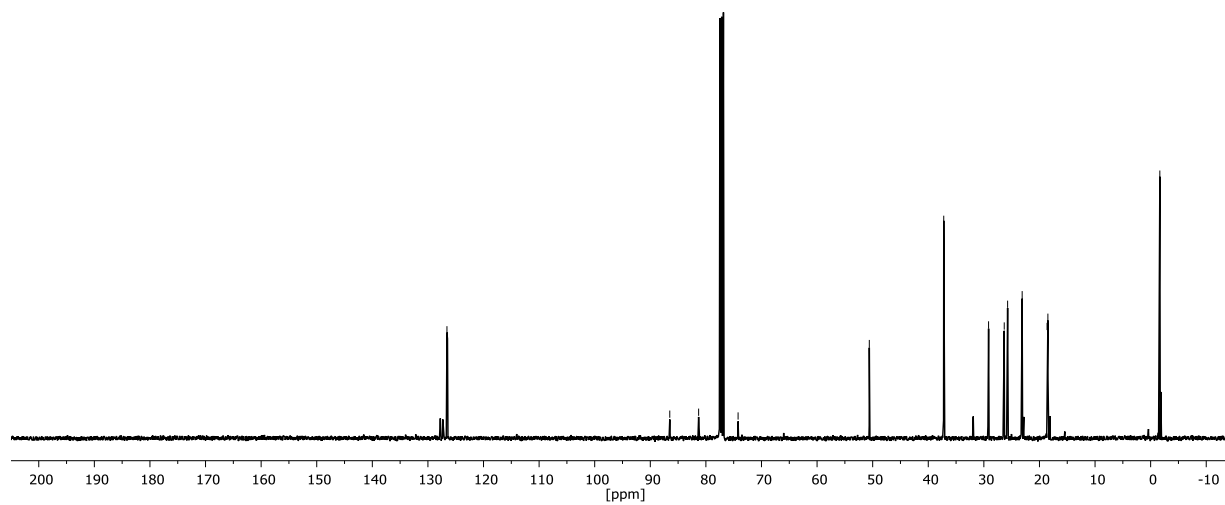
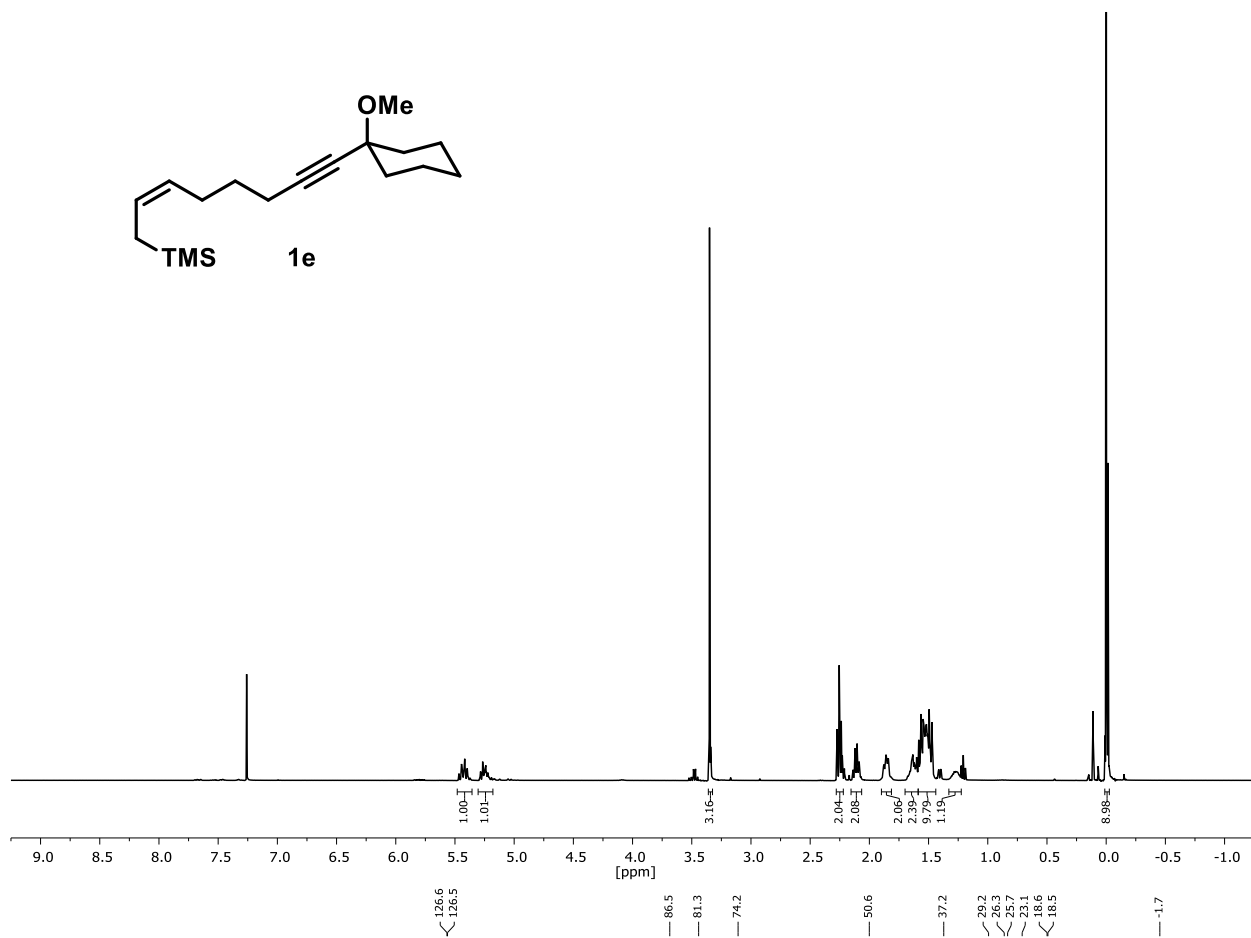
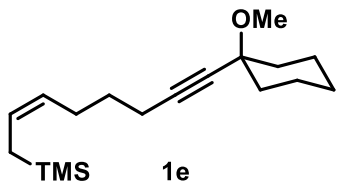
COPIES OF SPECTRA

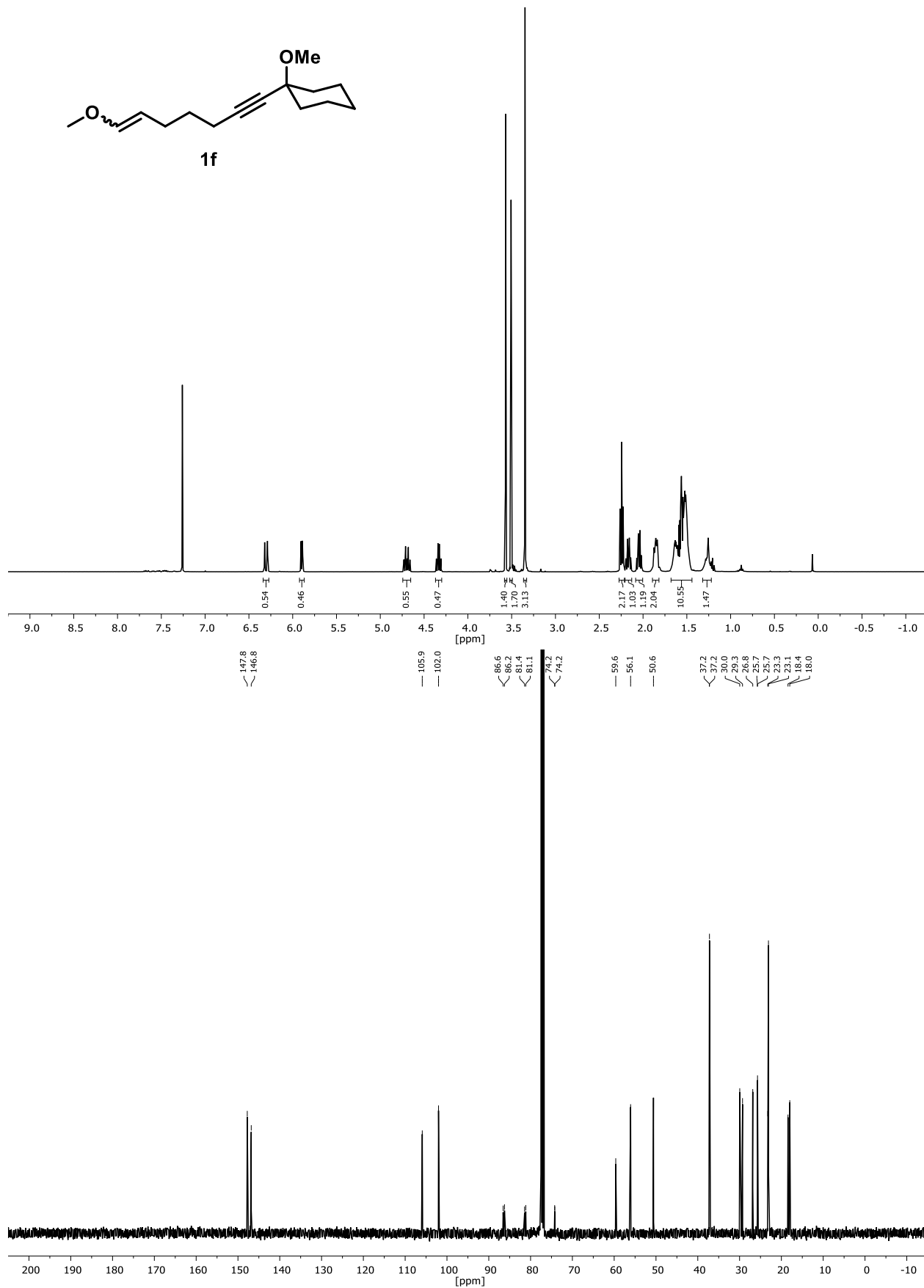
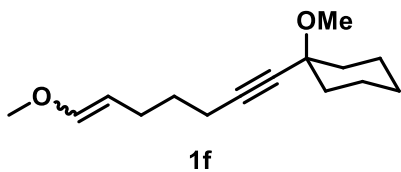


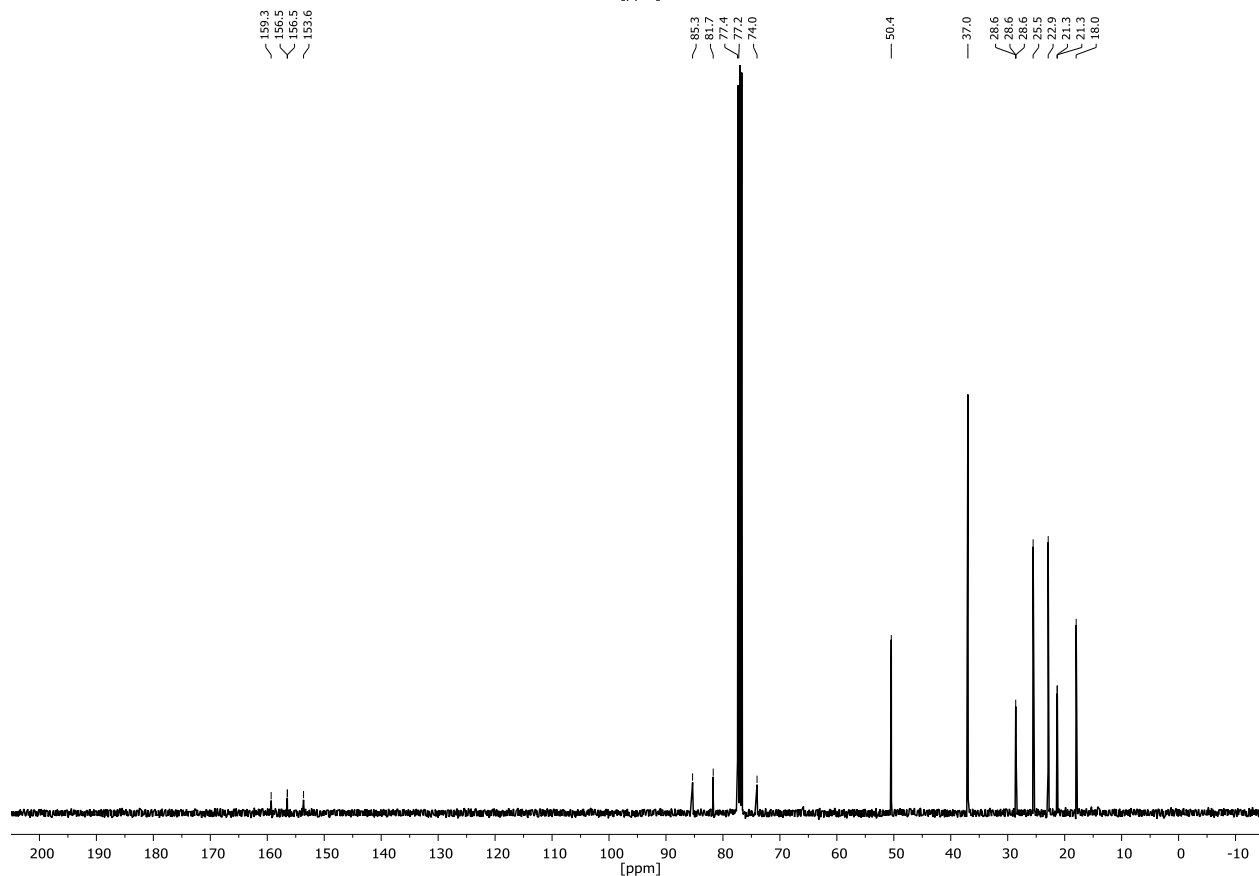
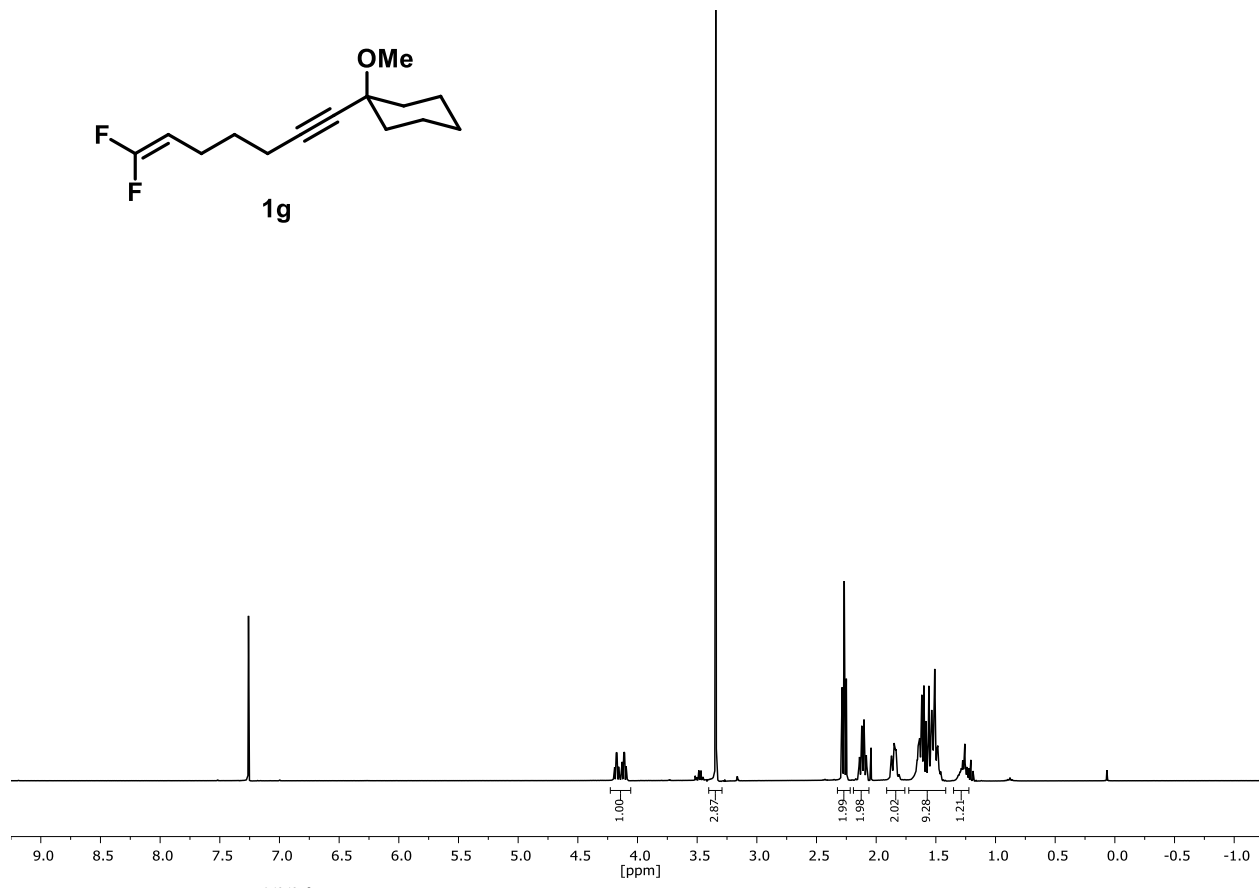
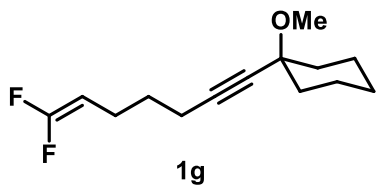


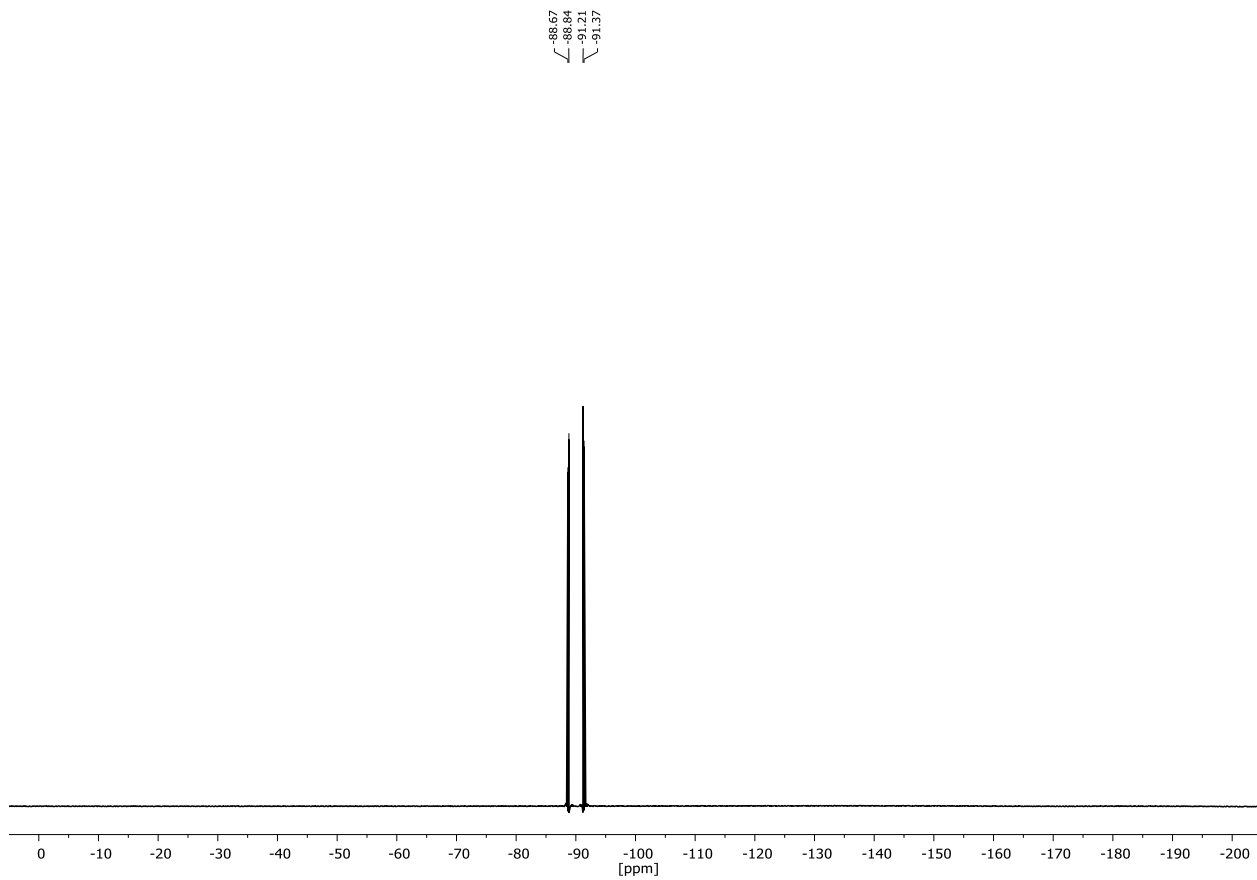


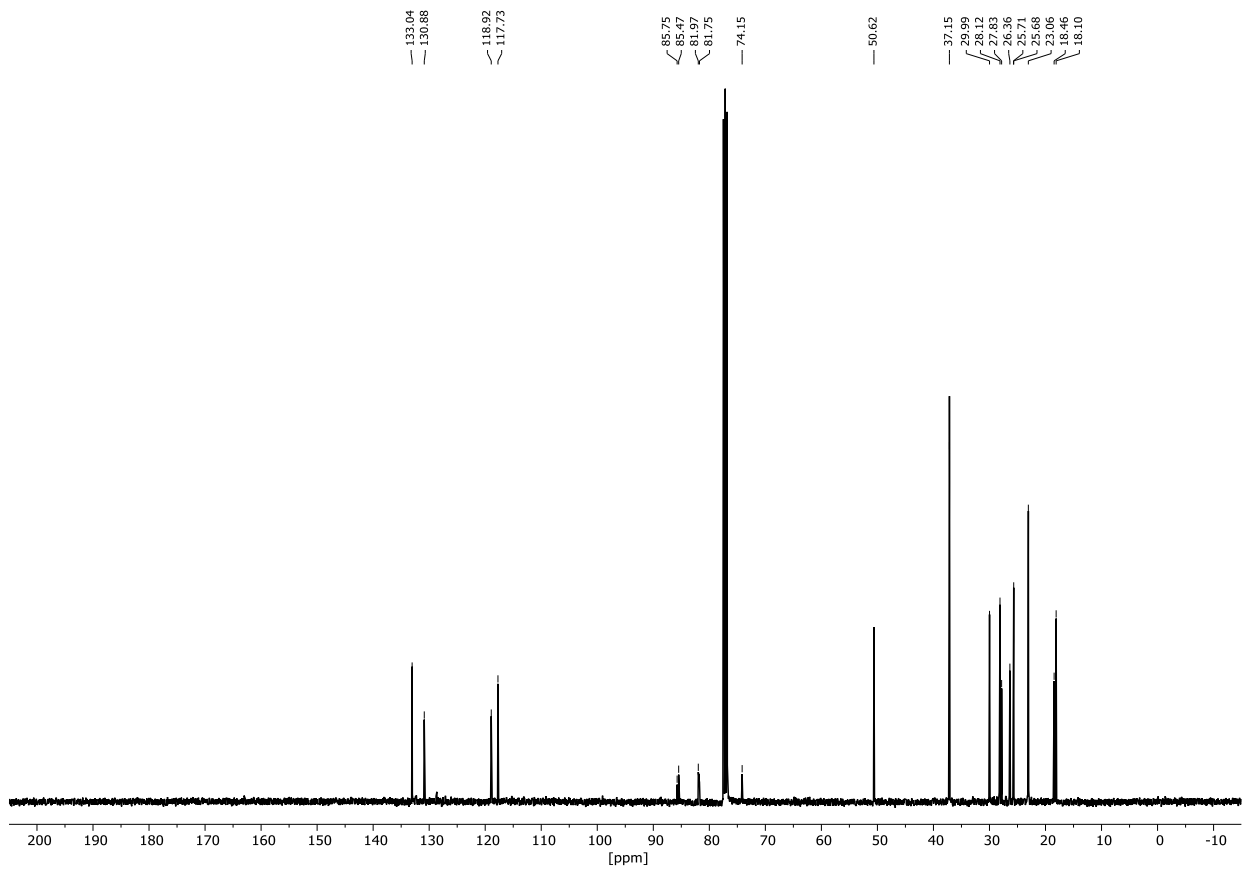
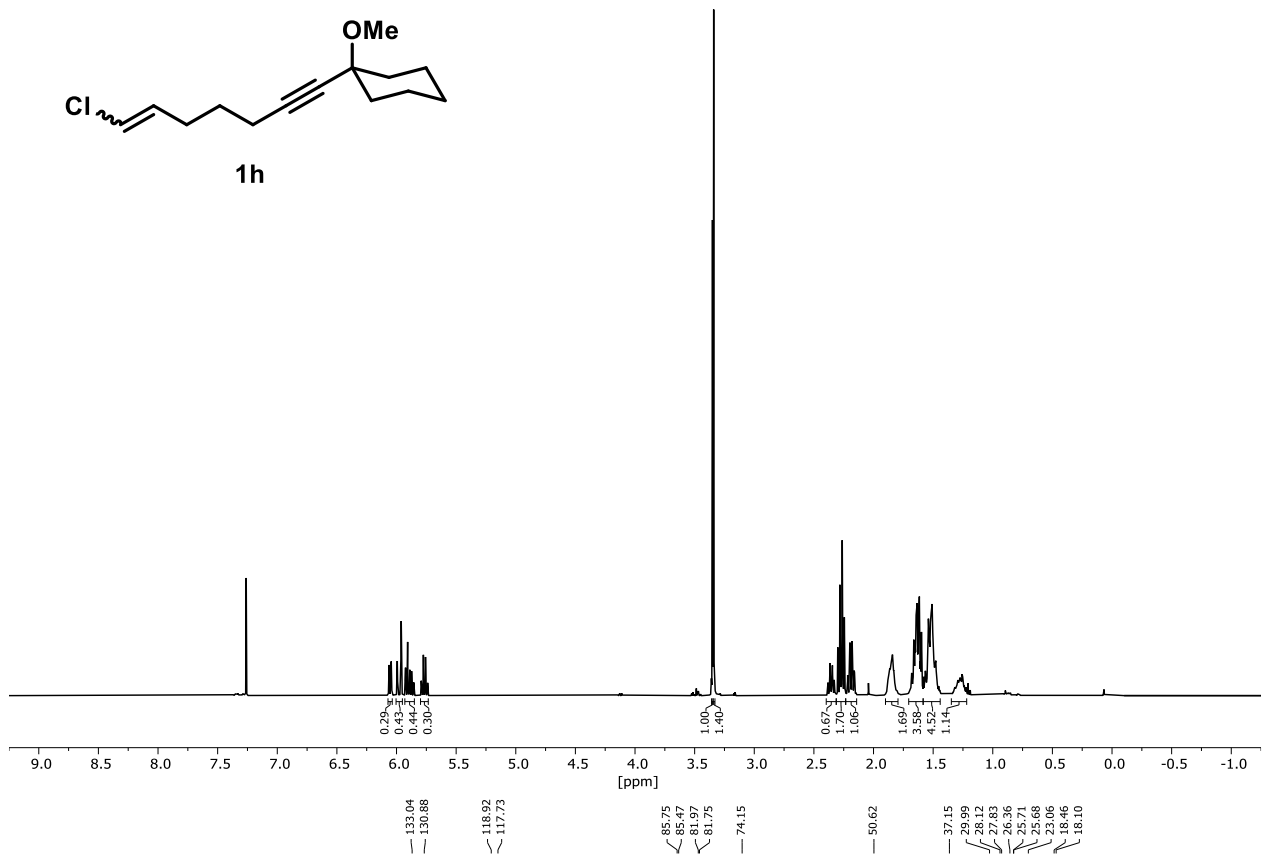
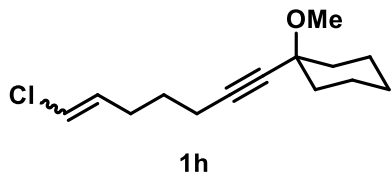


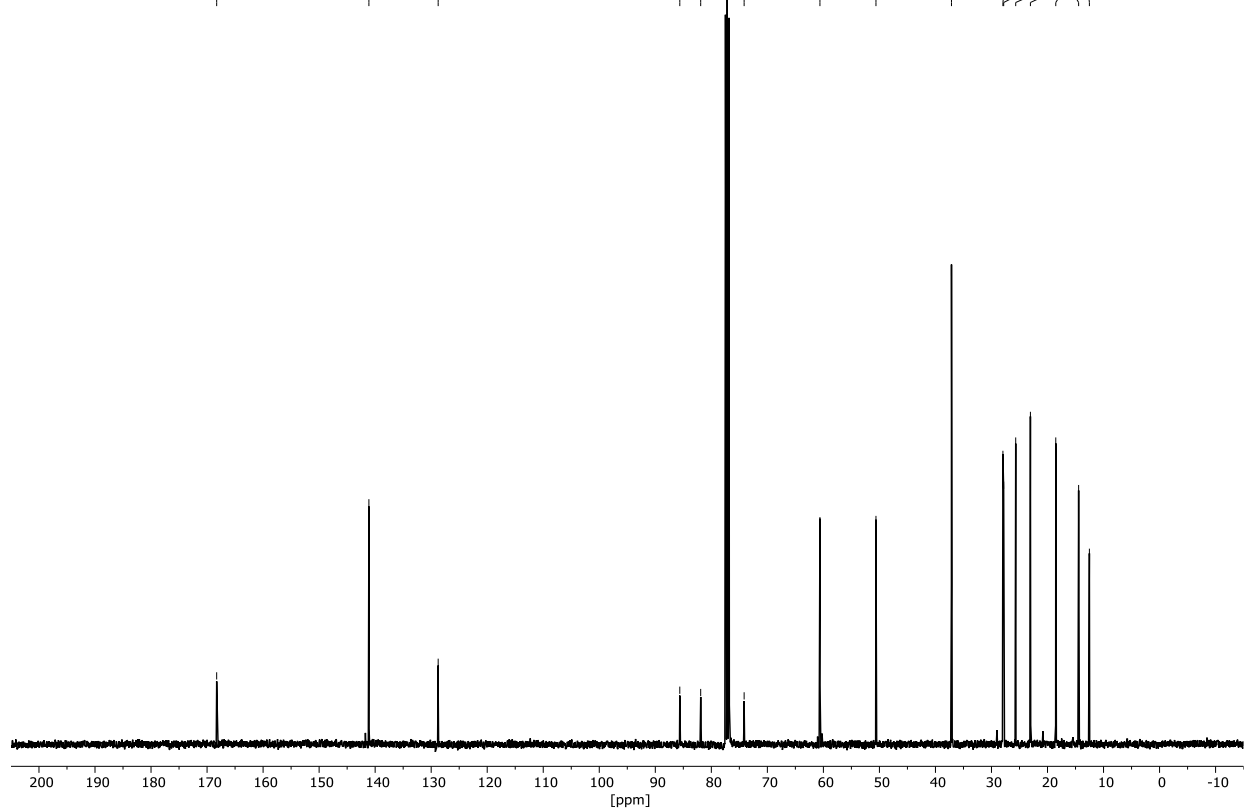
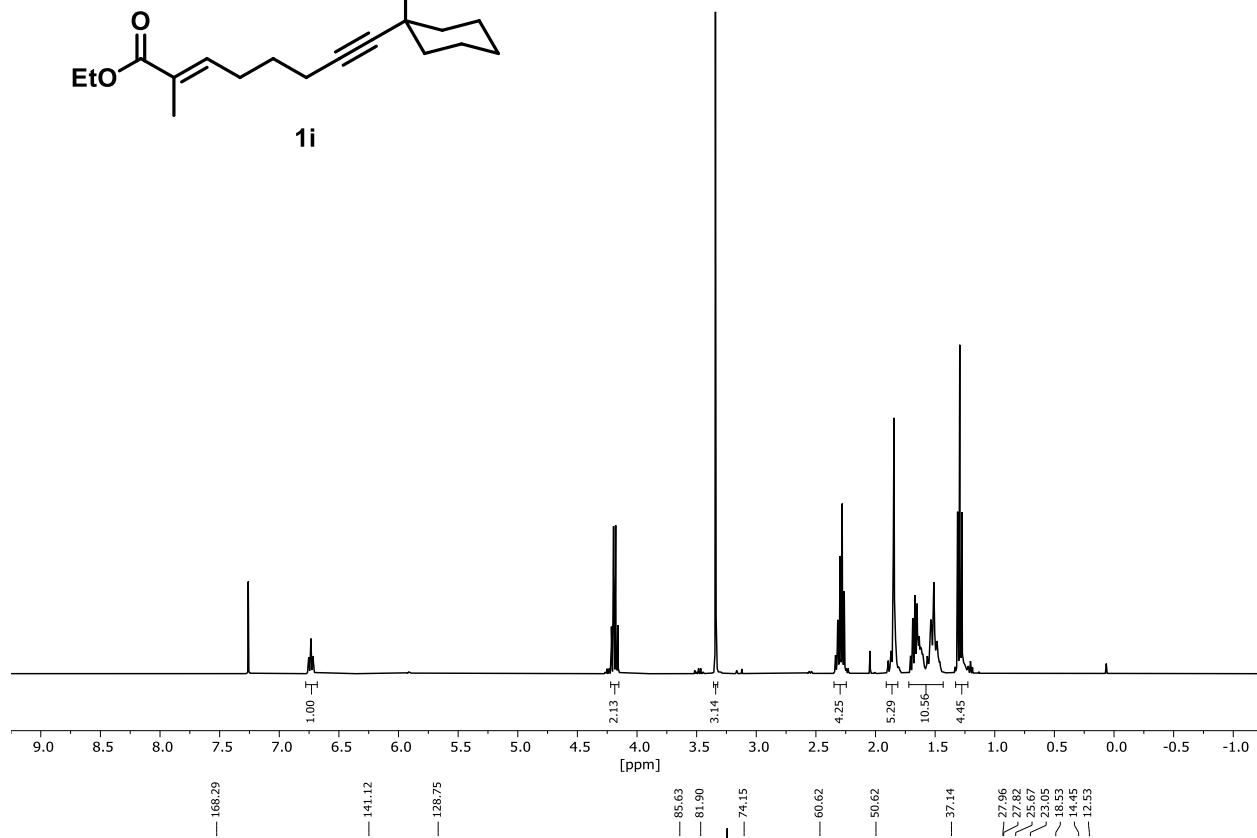
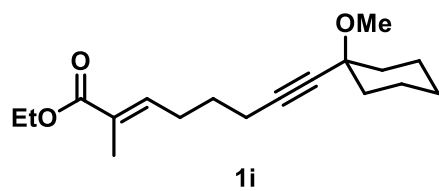


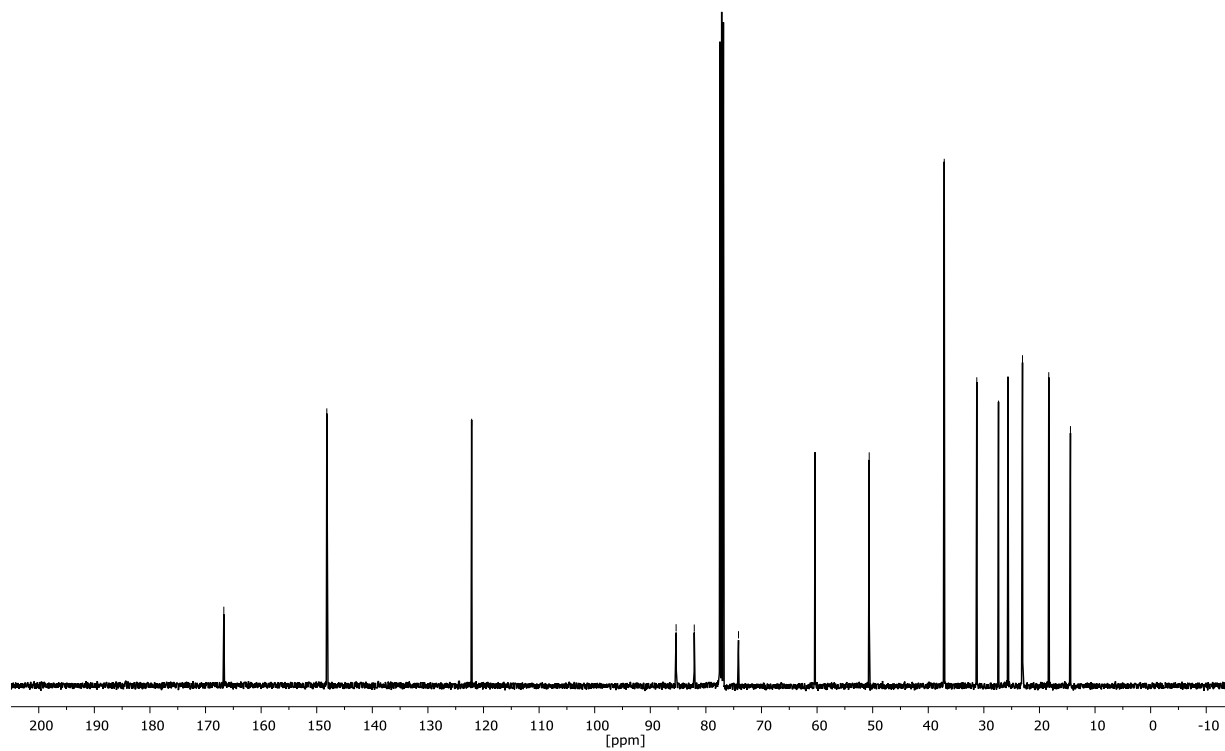
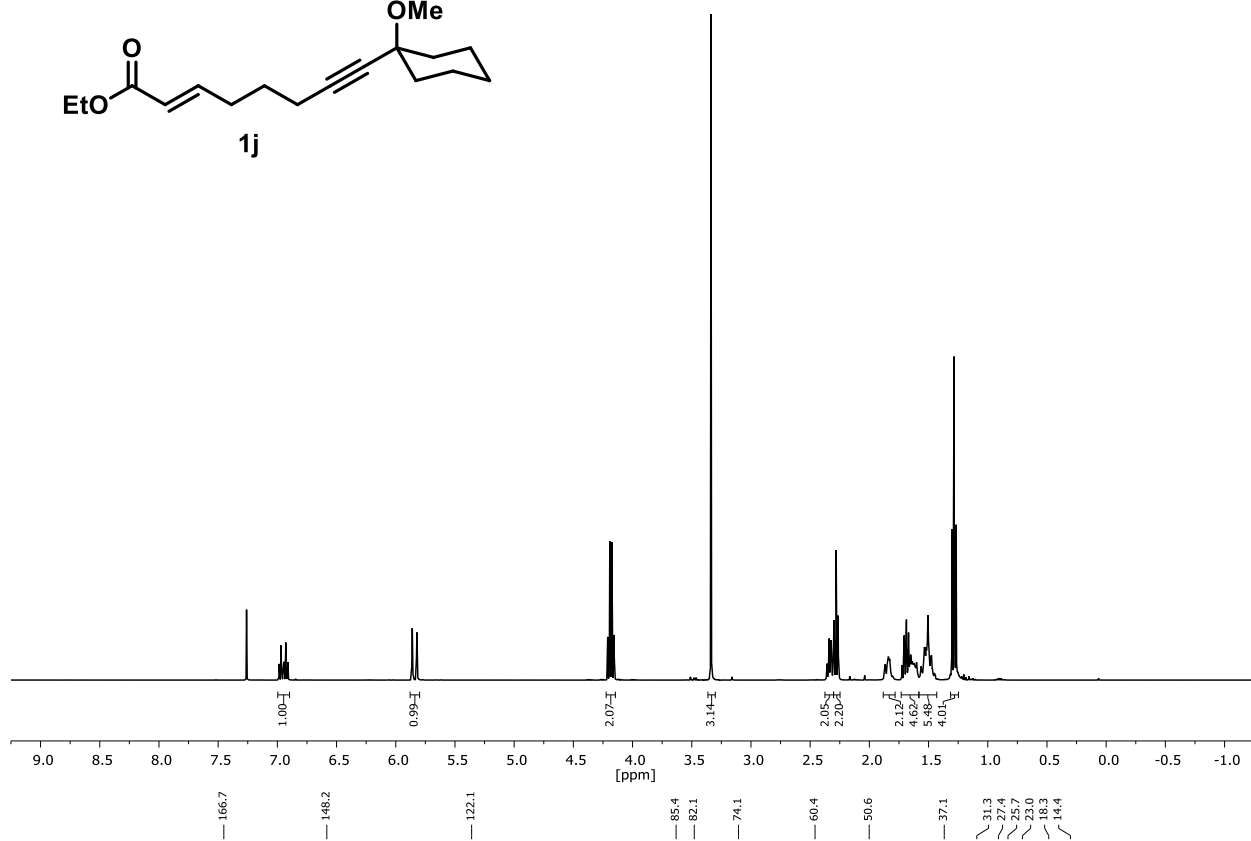
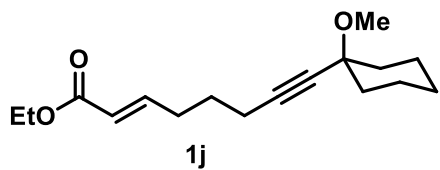


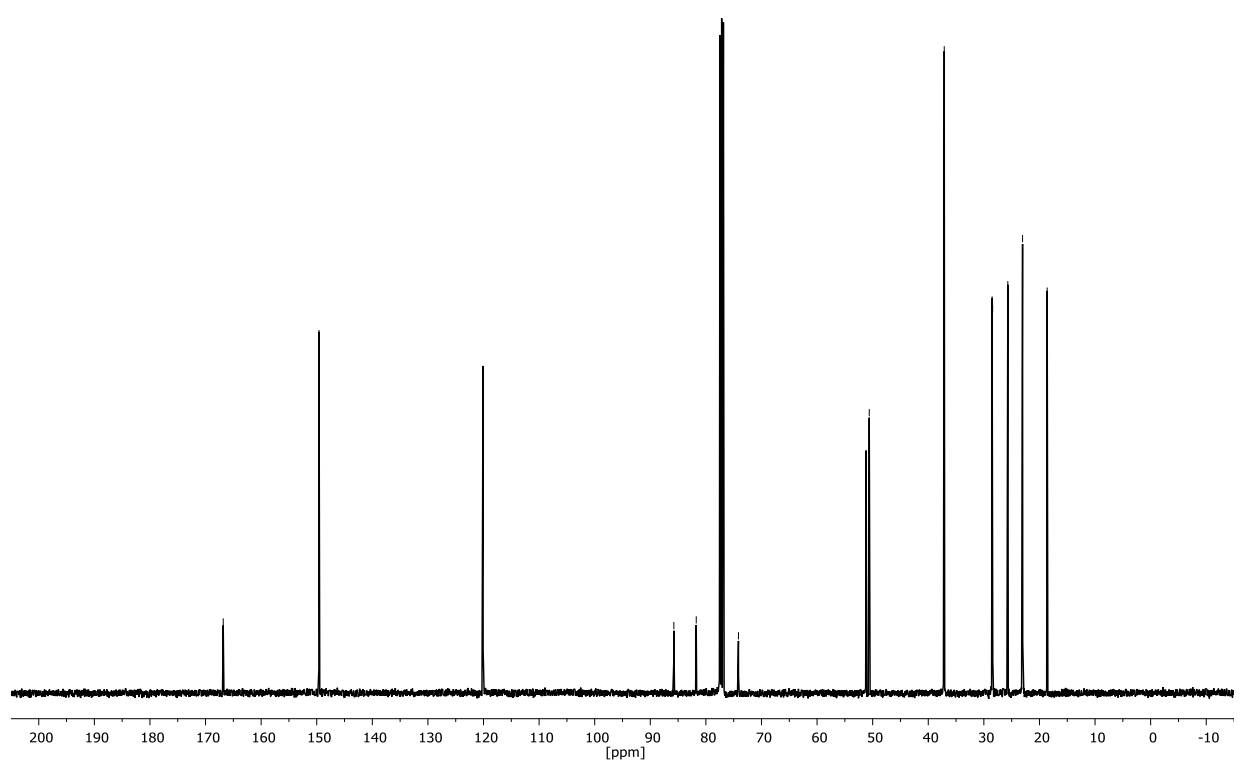
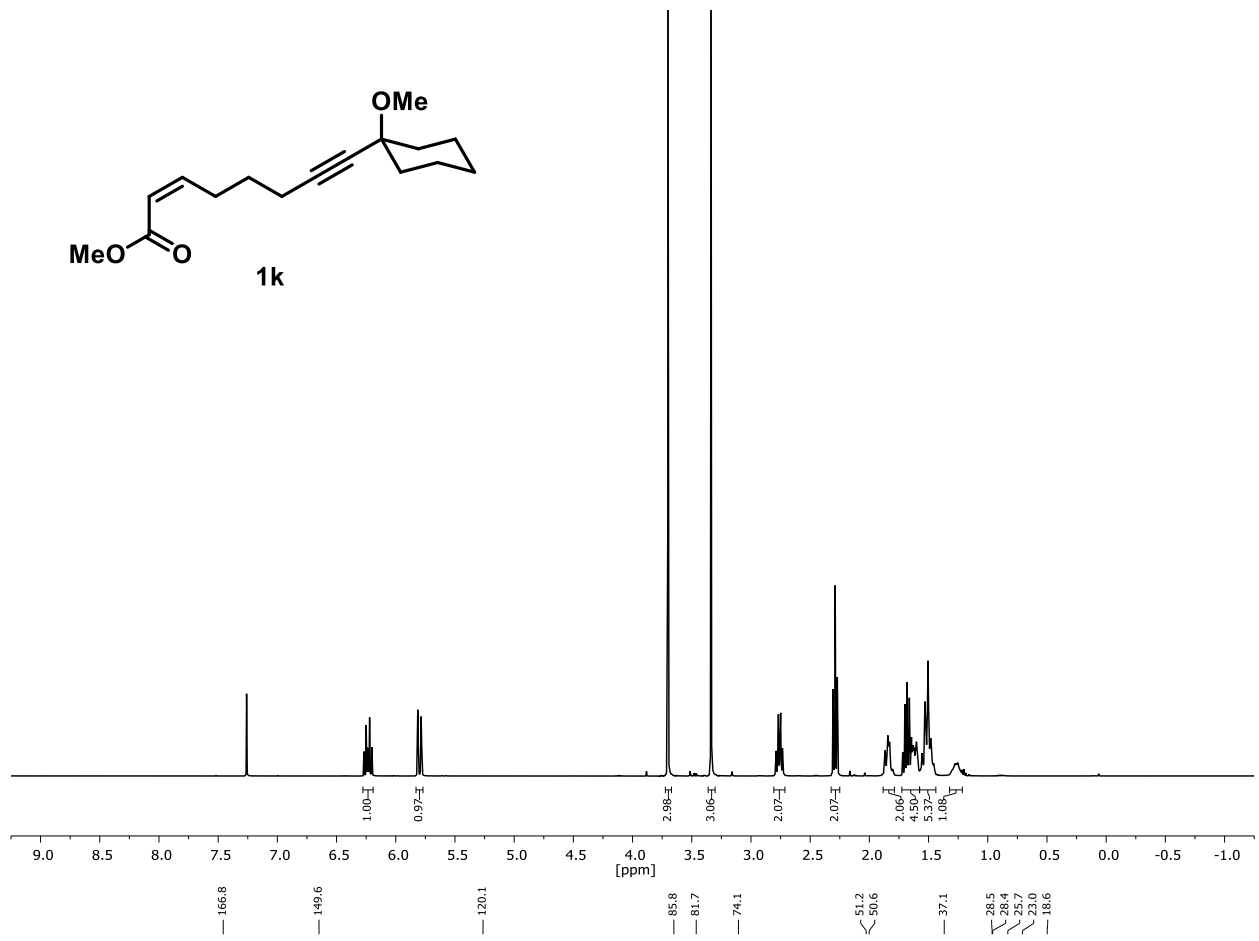
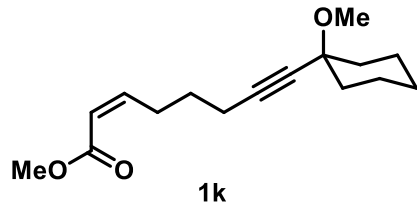


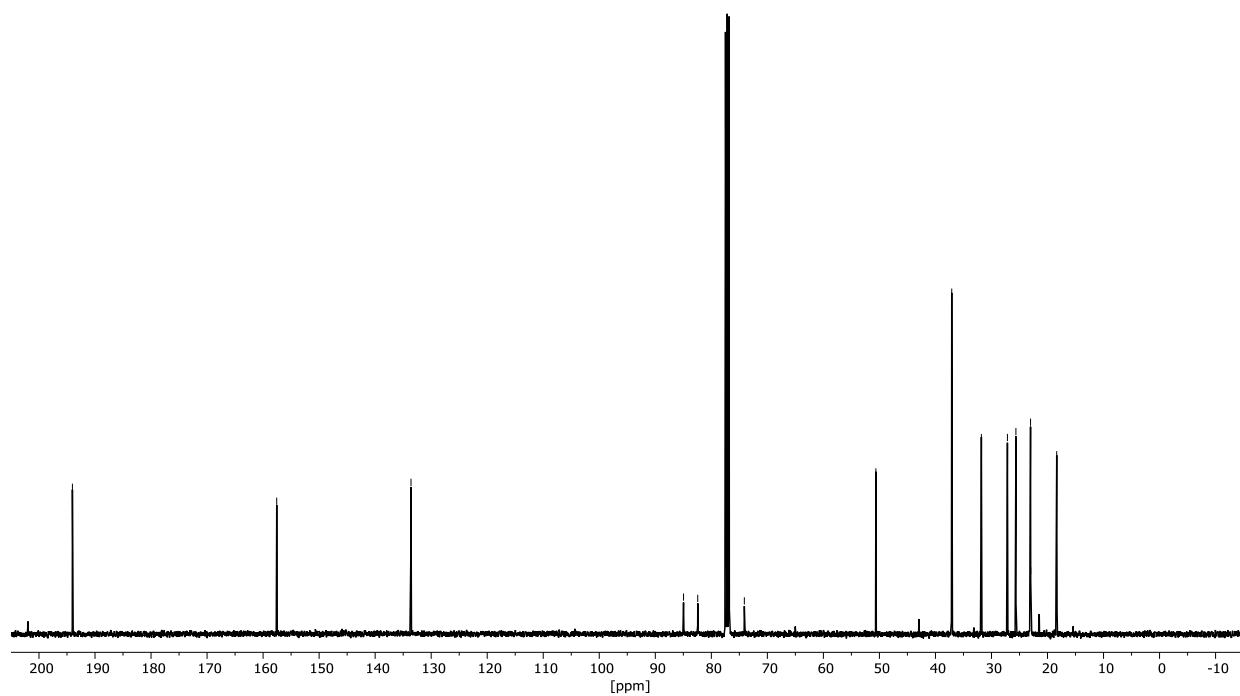
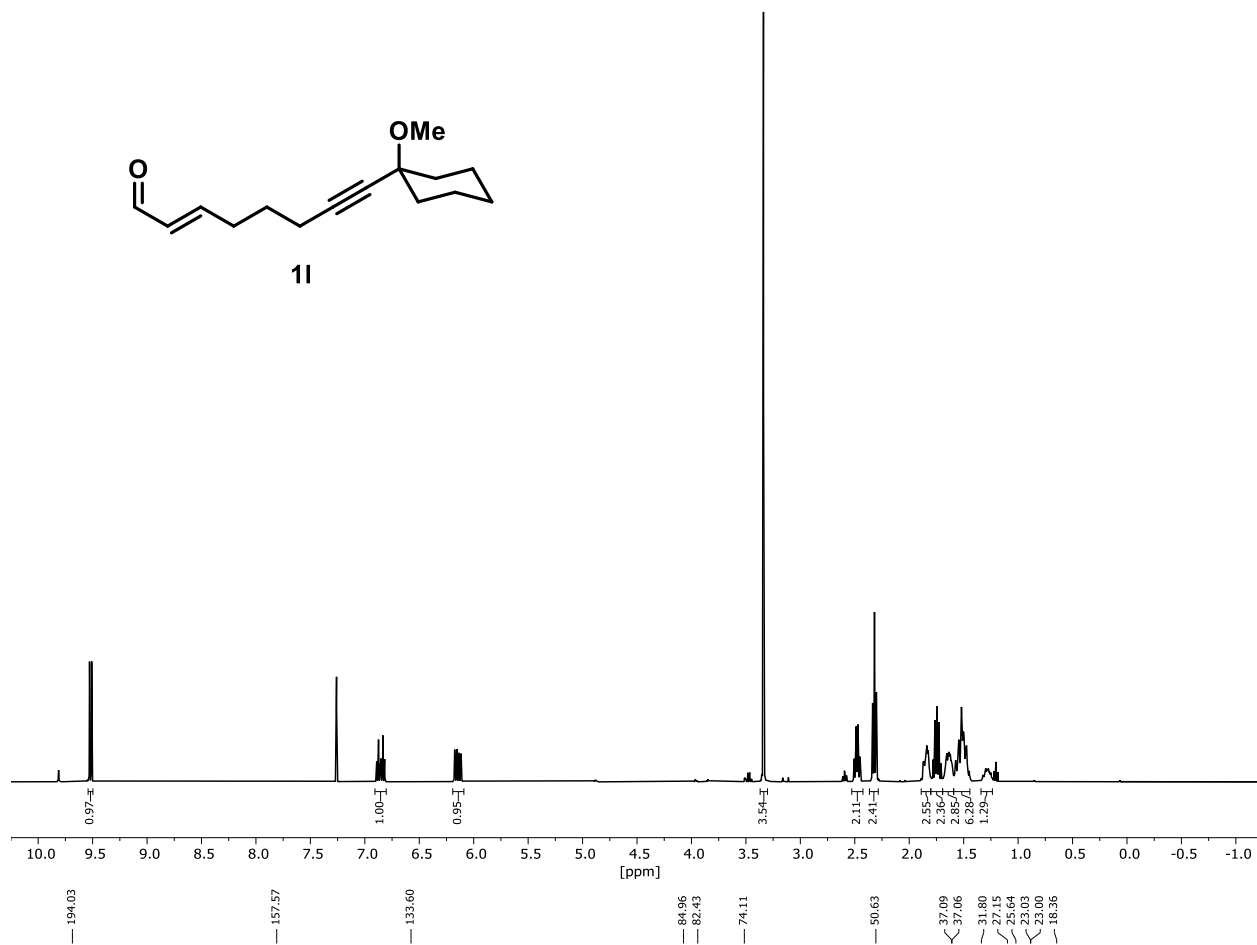
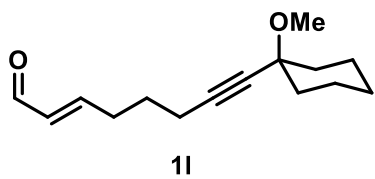


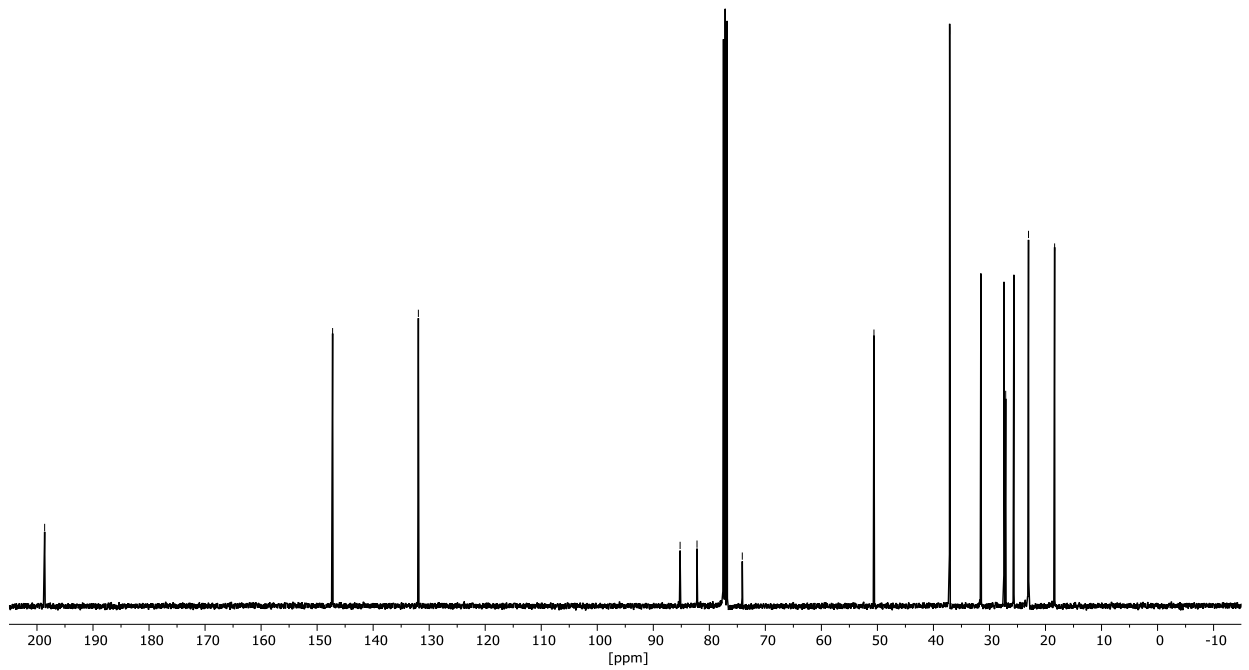
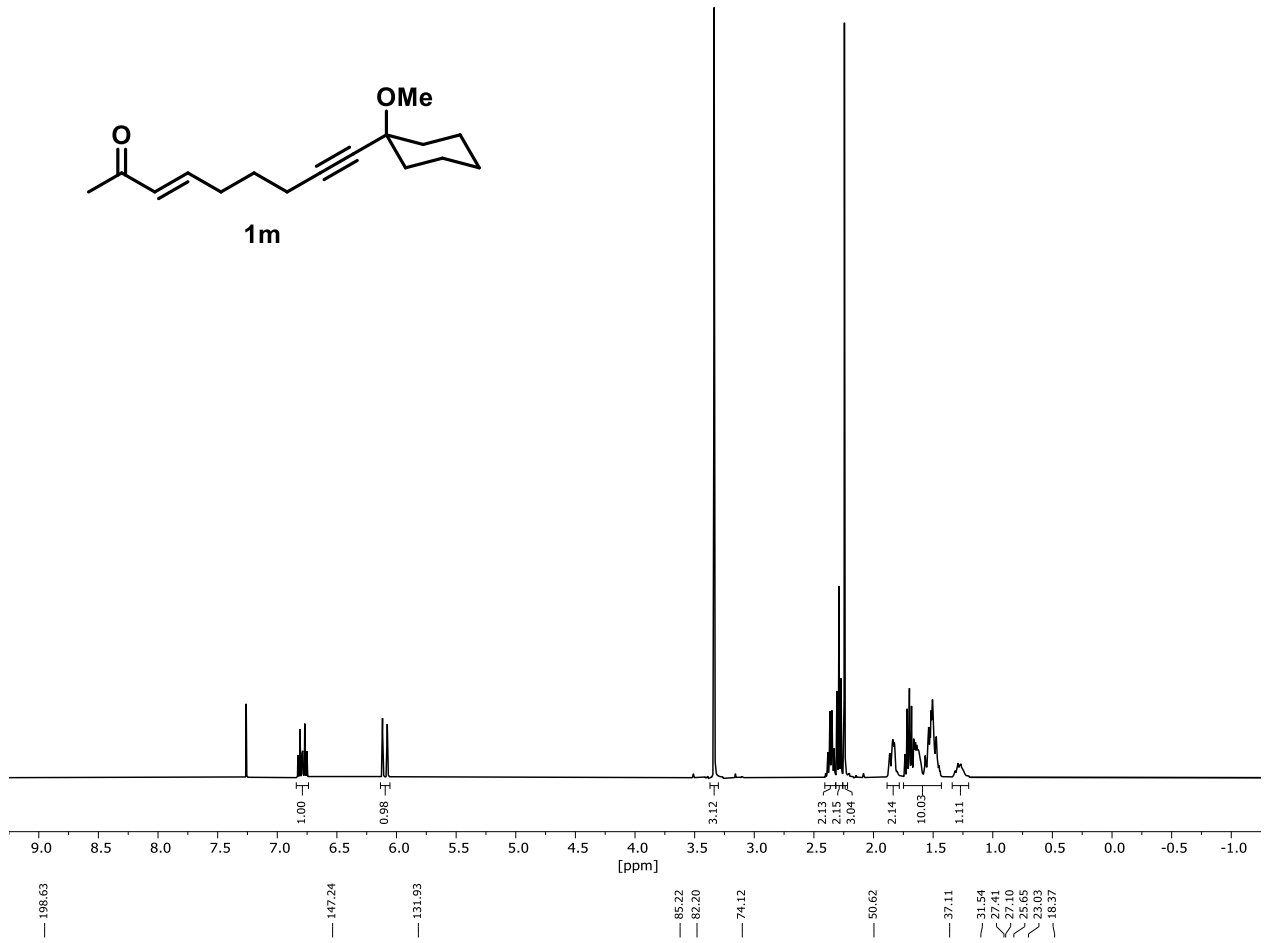
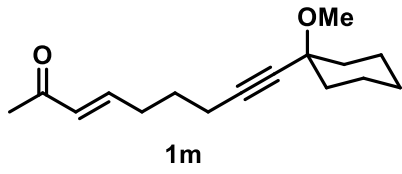


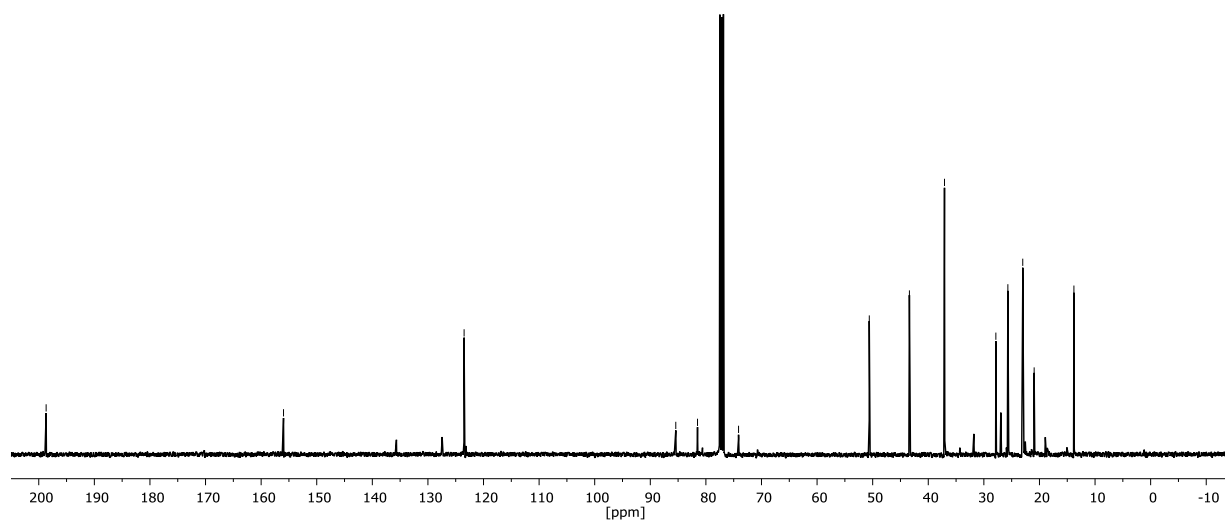
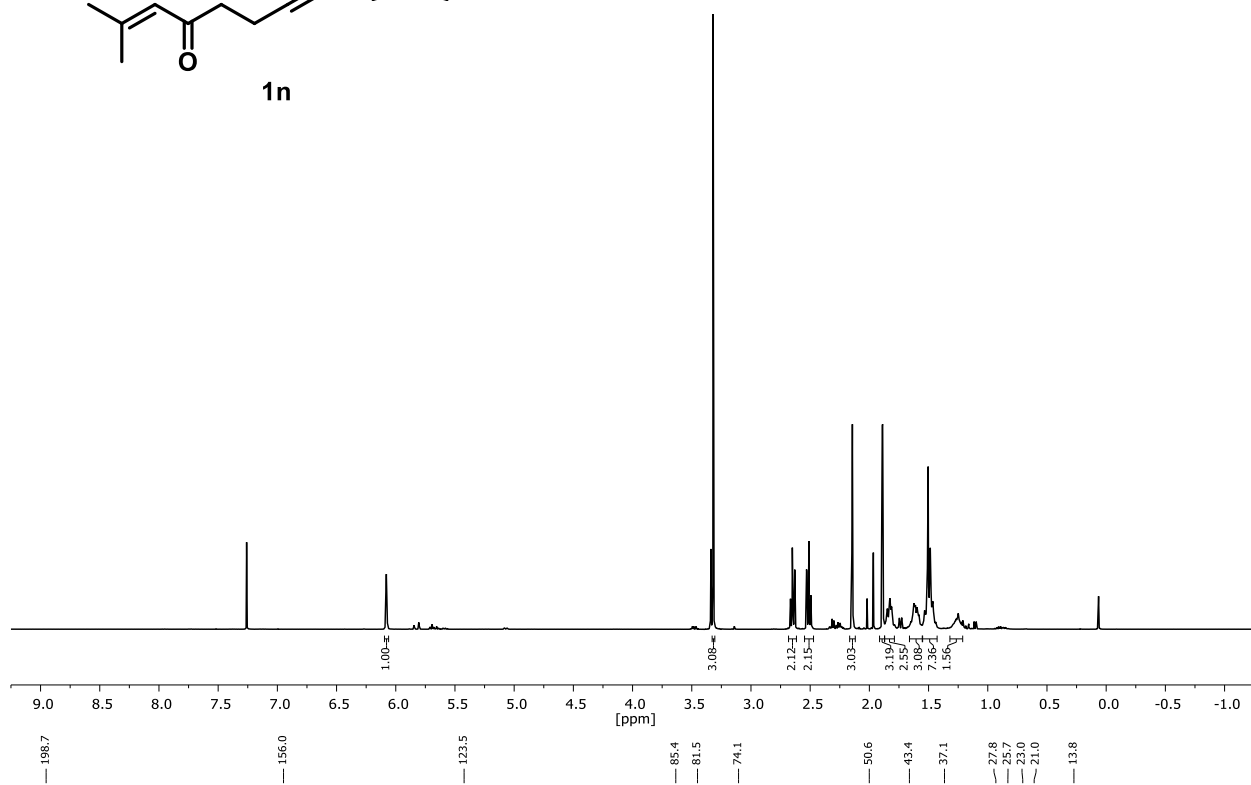
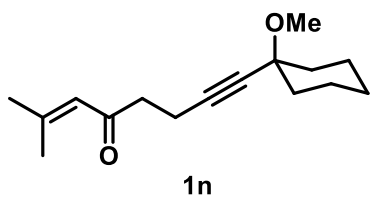


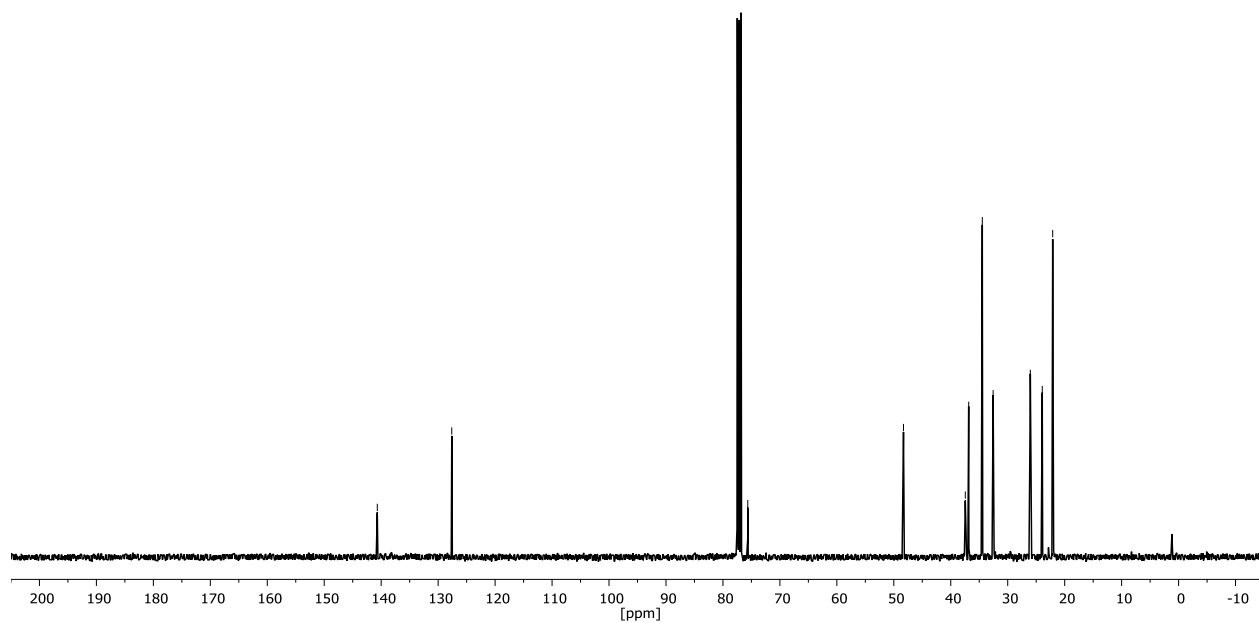
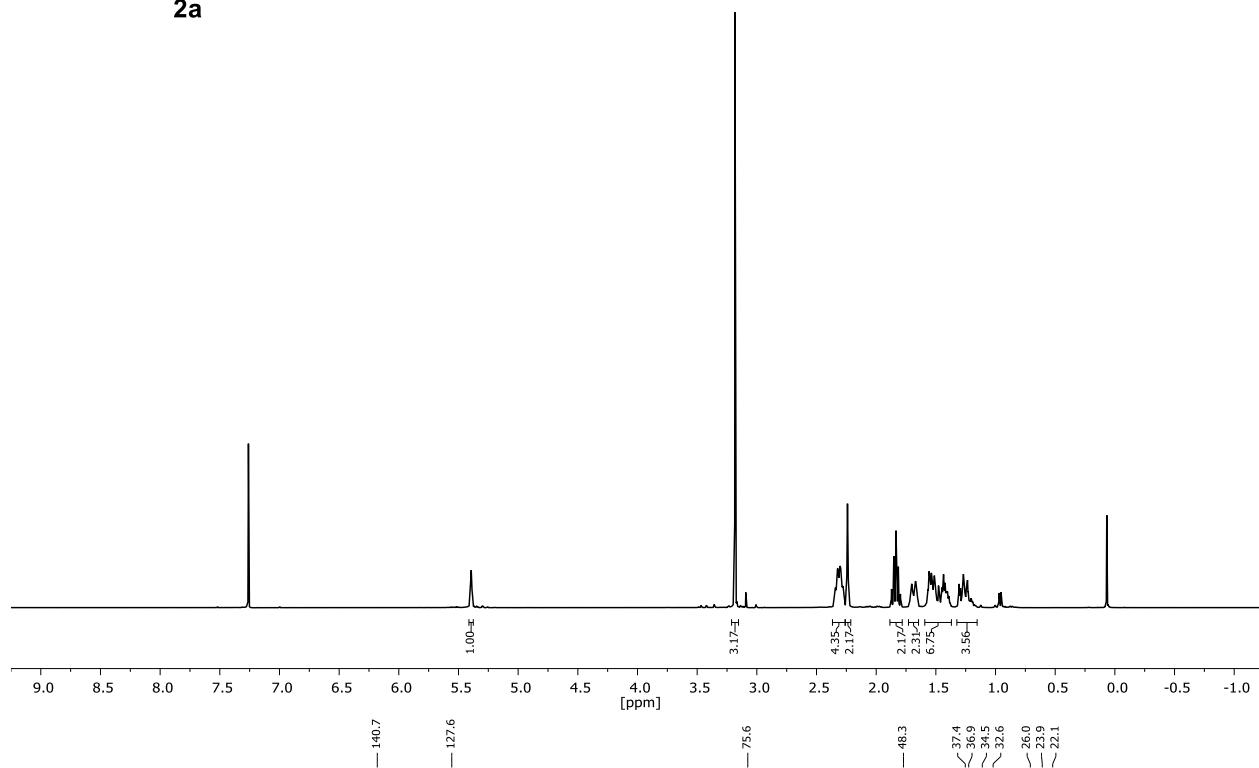
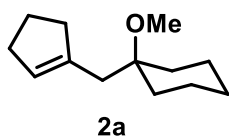


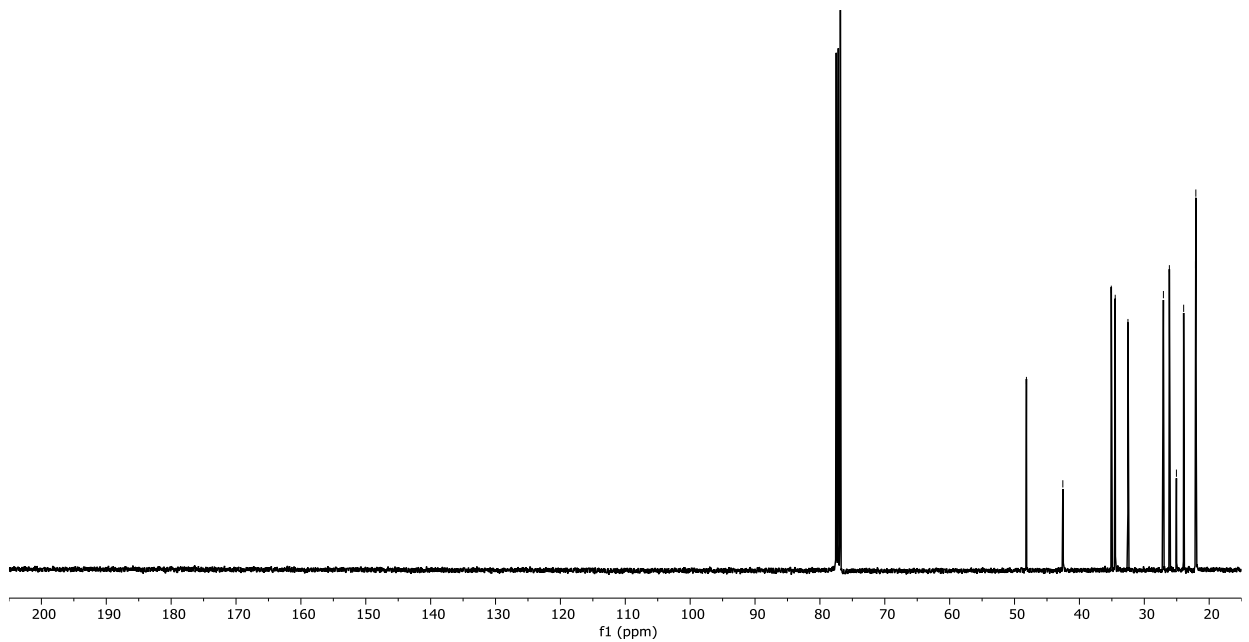
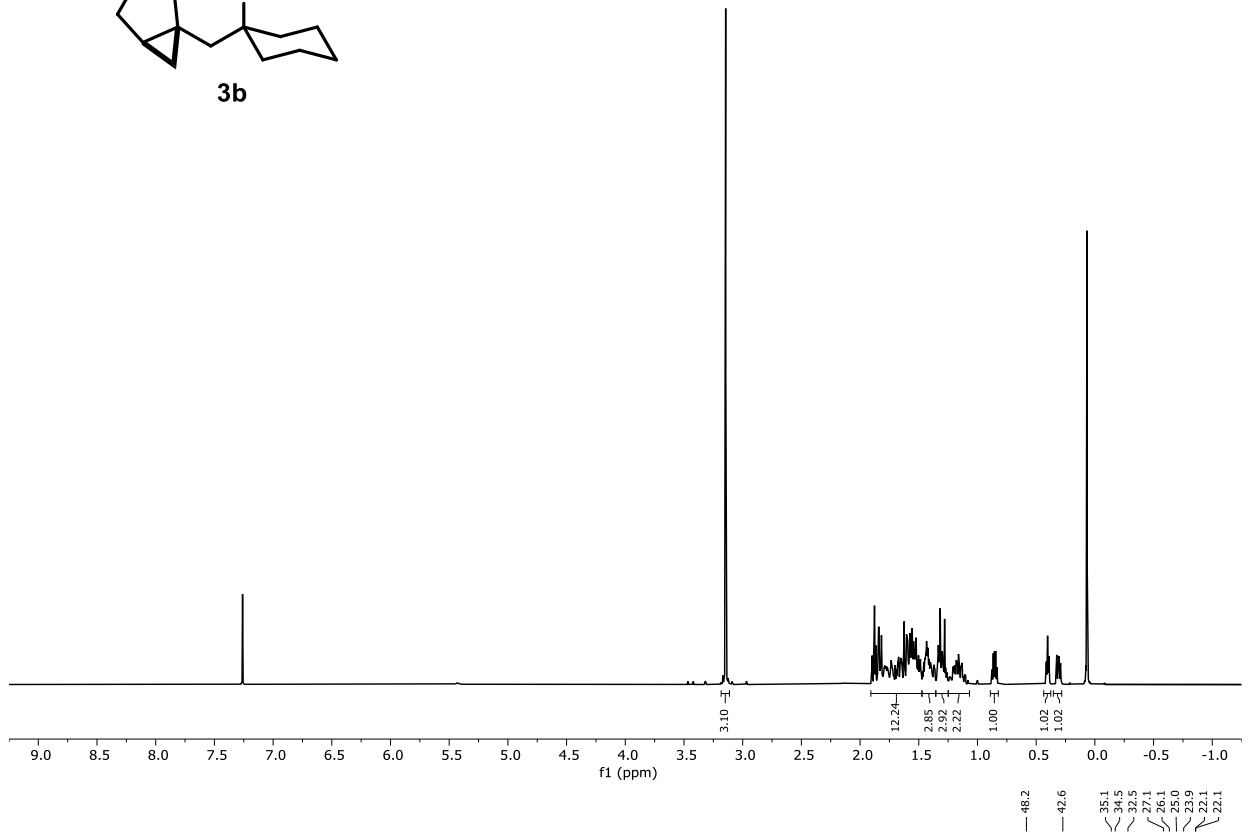
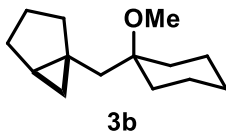


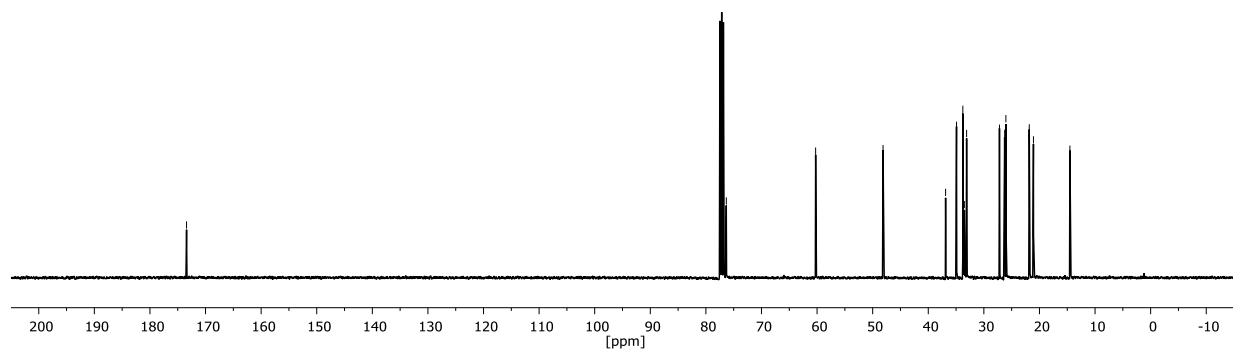
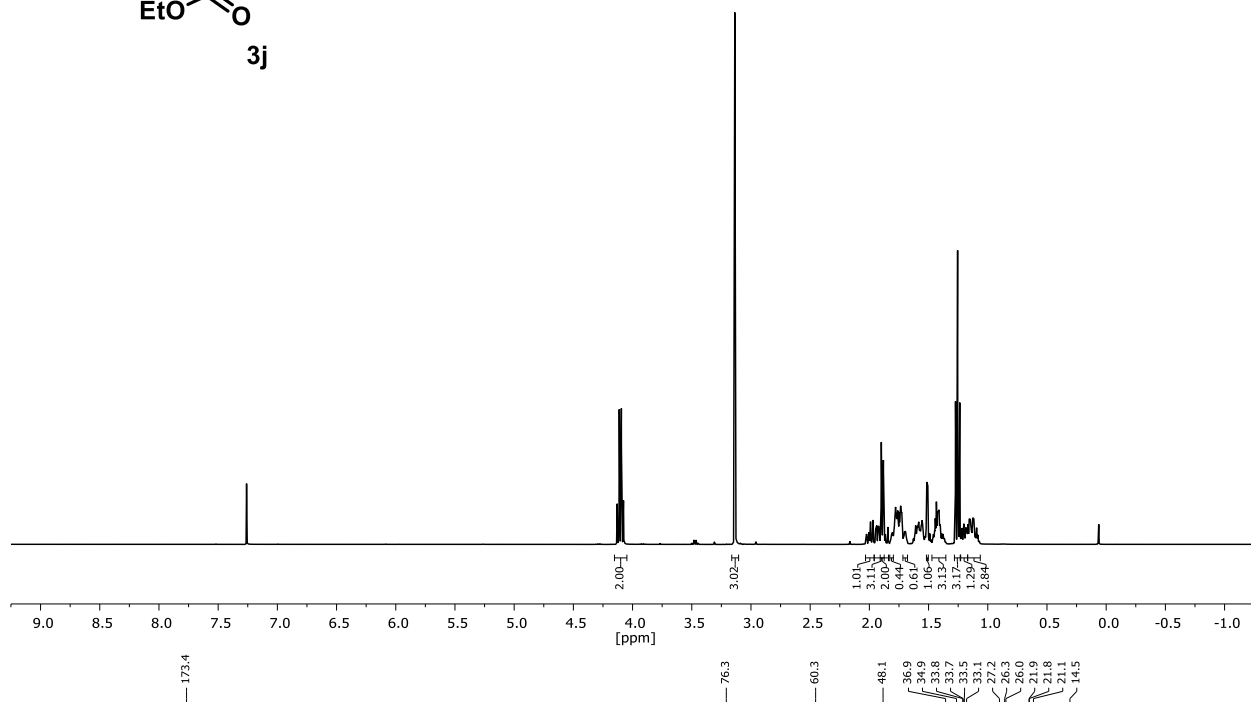
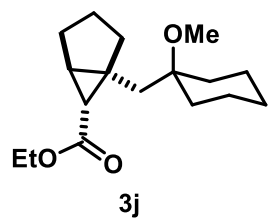


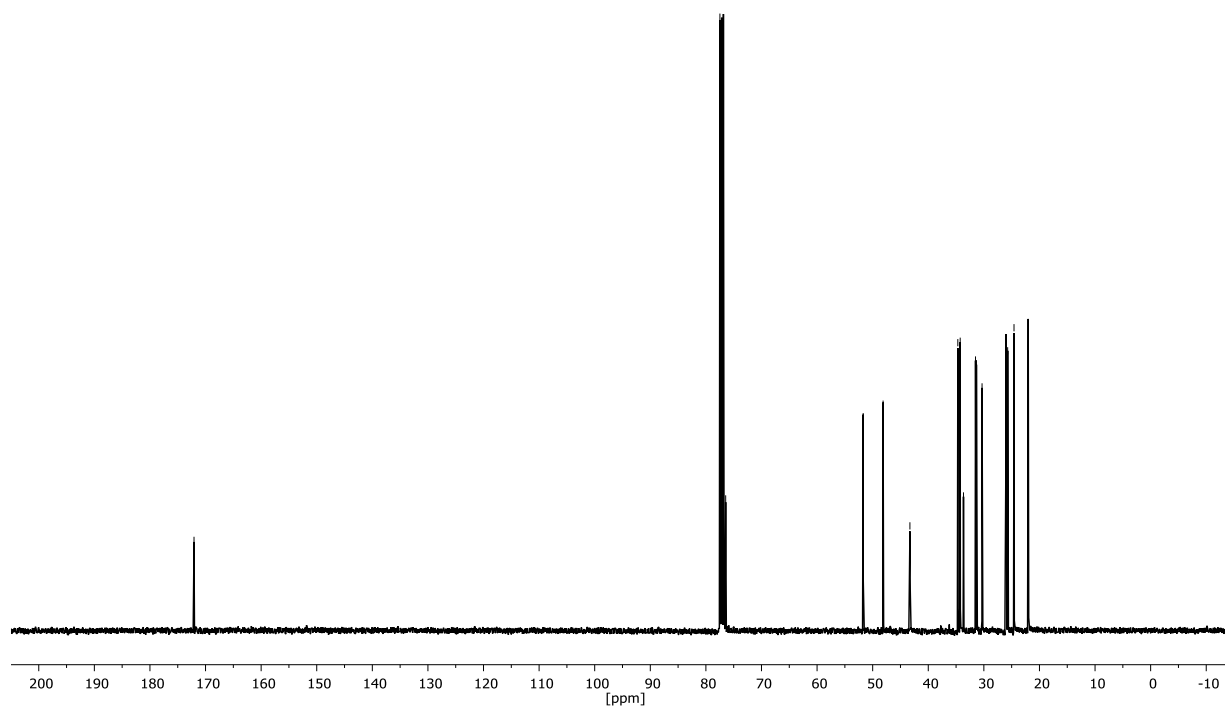
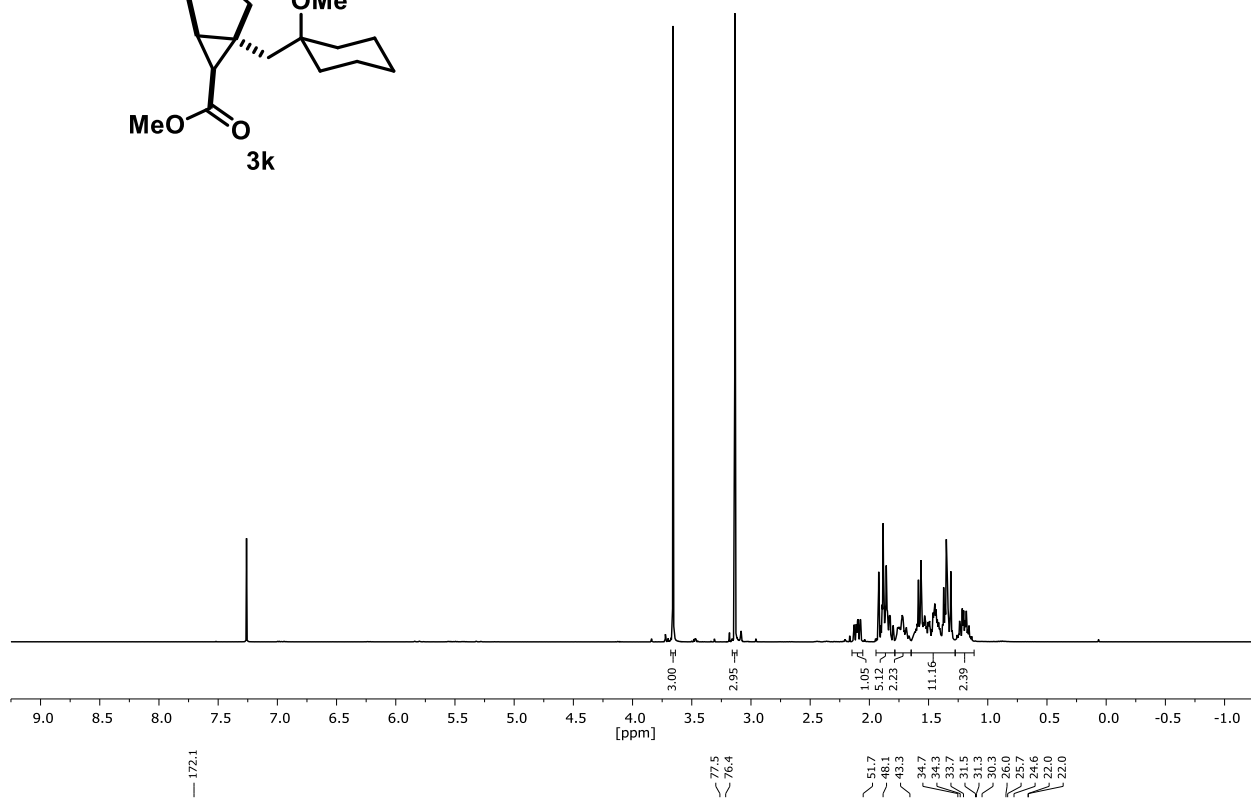
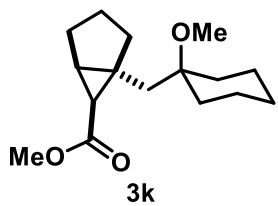


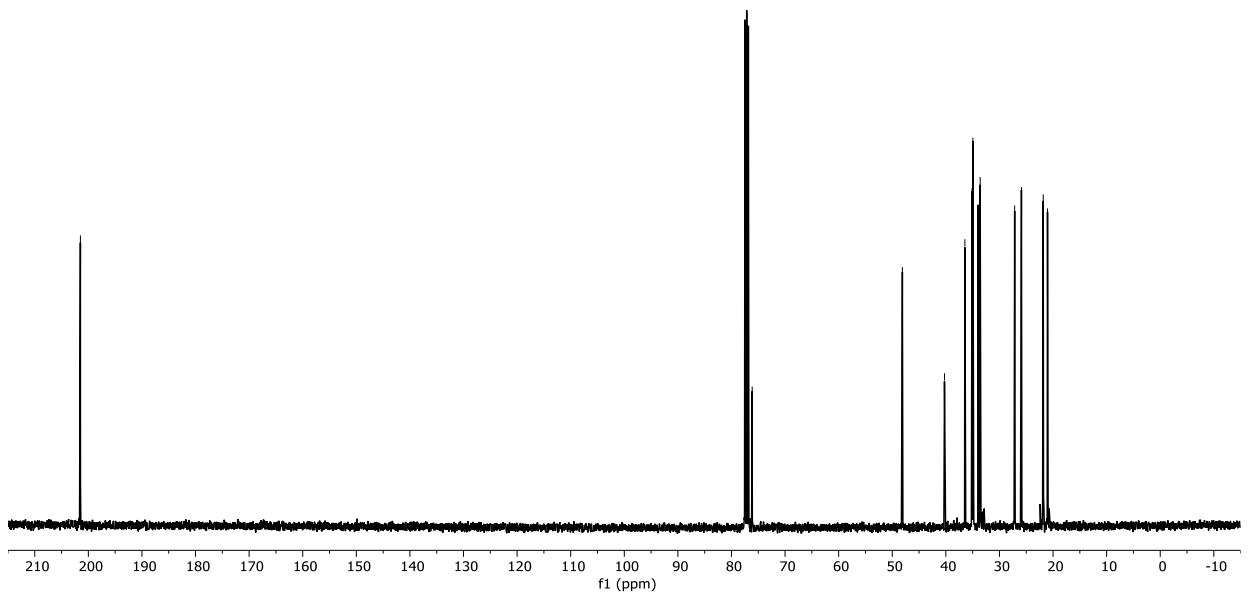
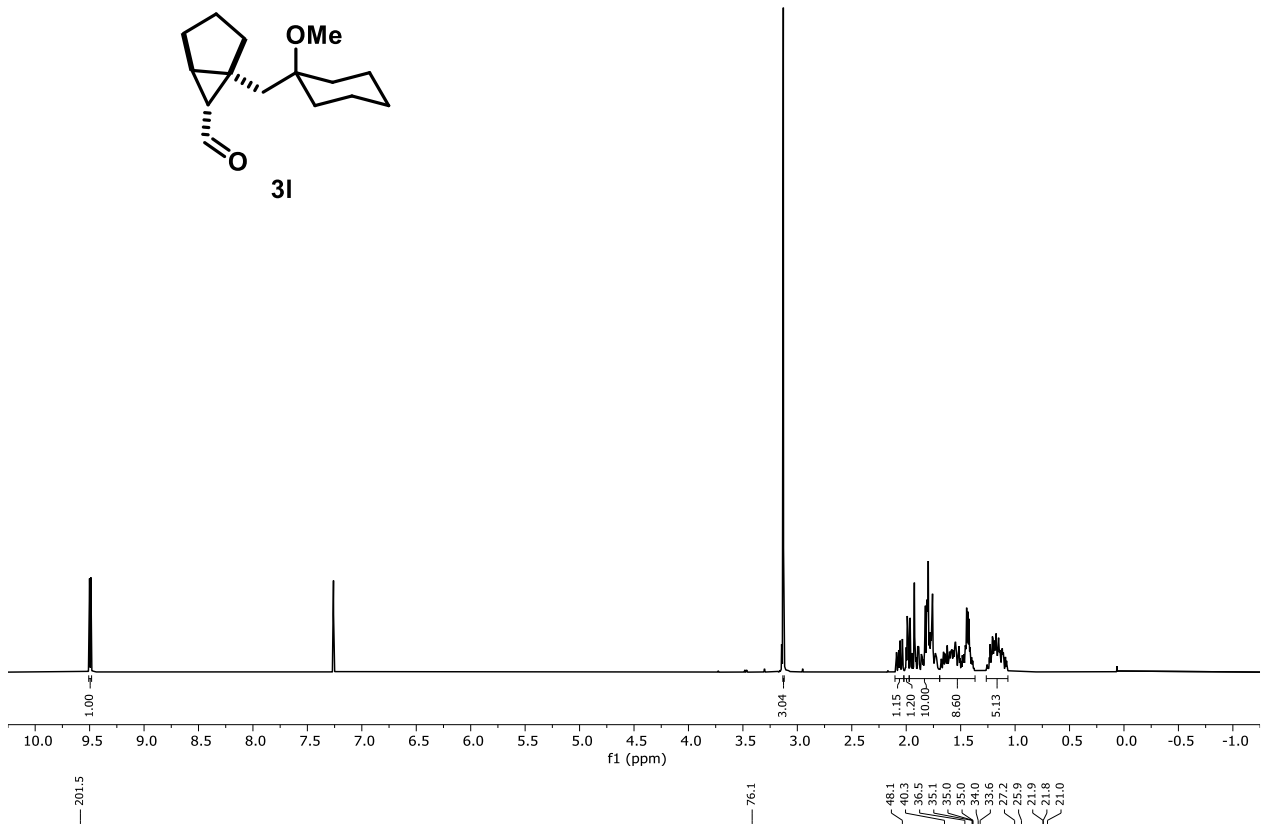
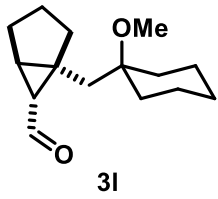


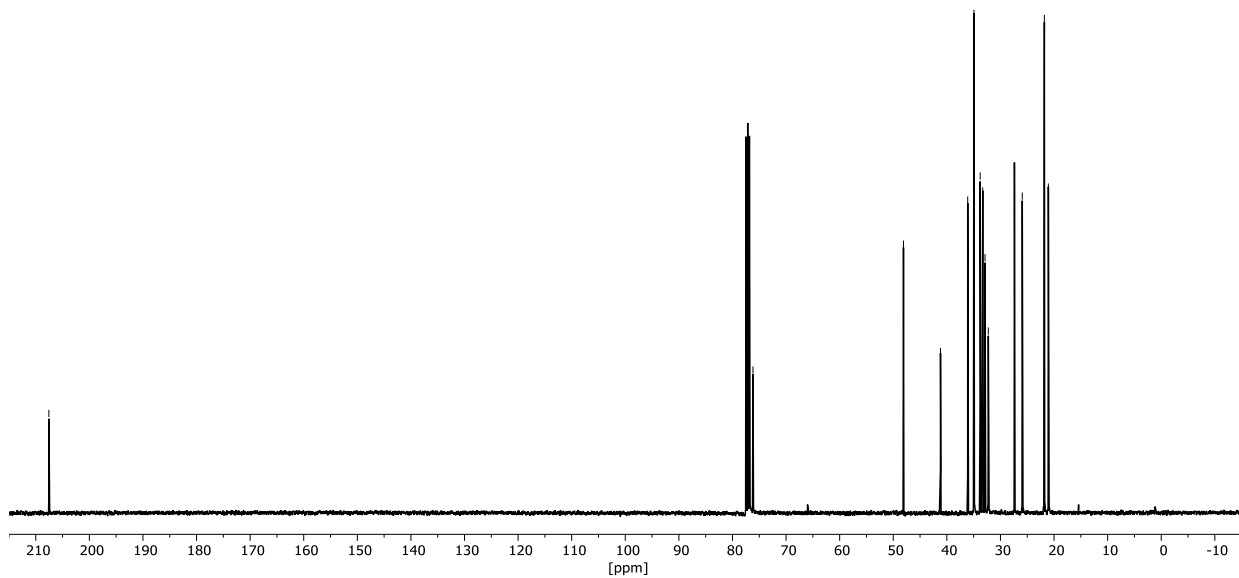
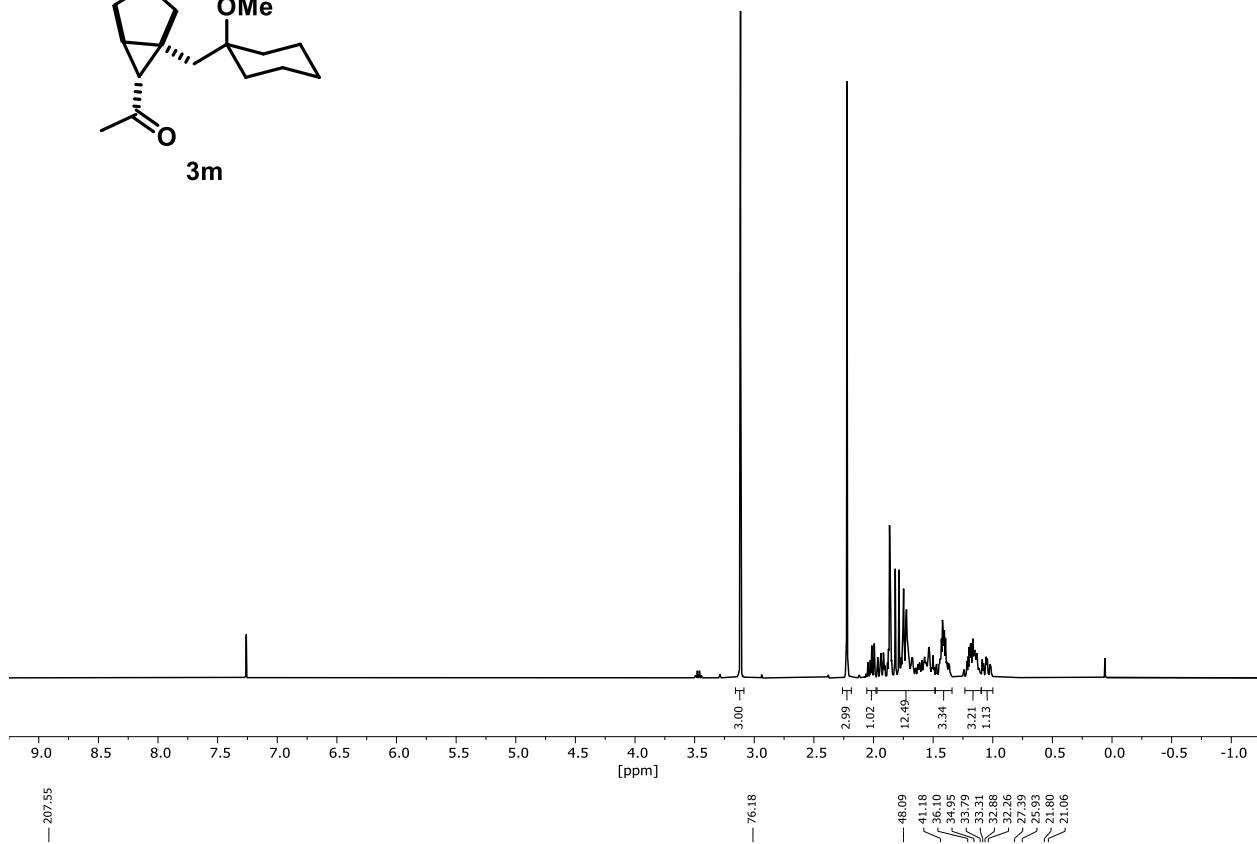
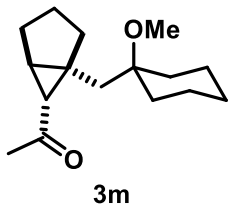


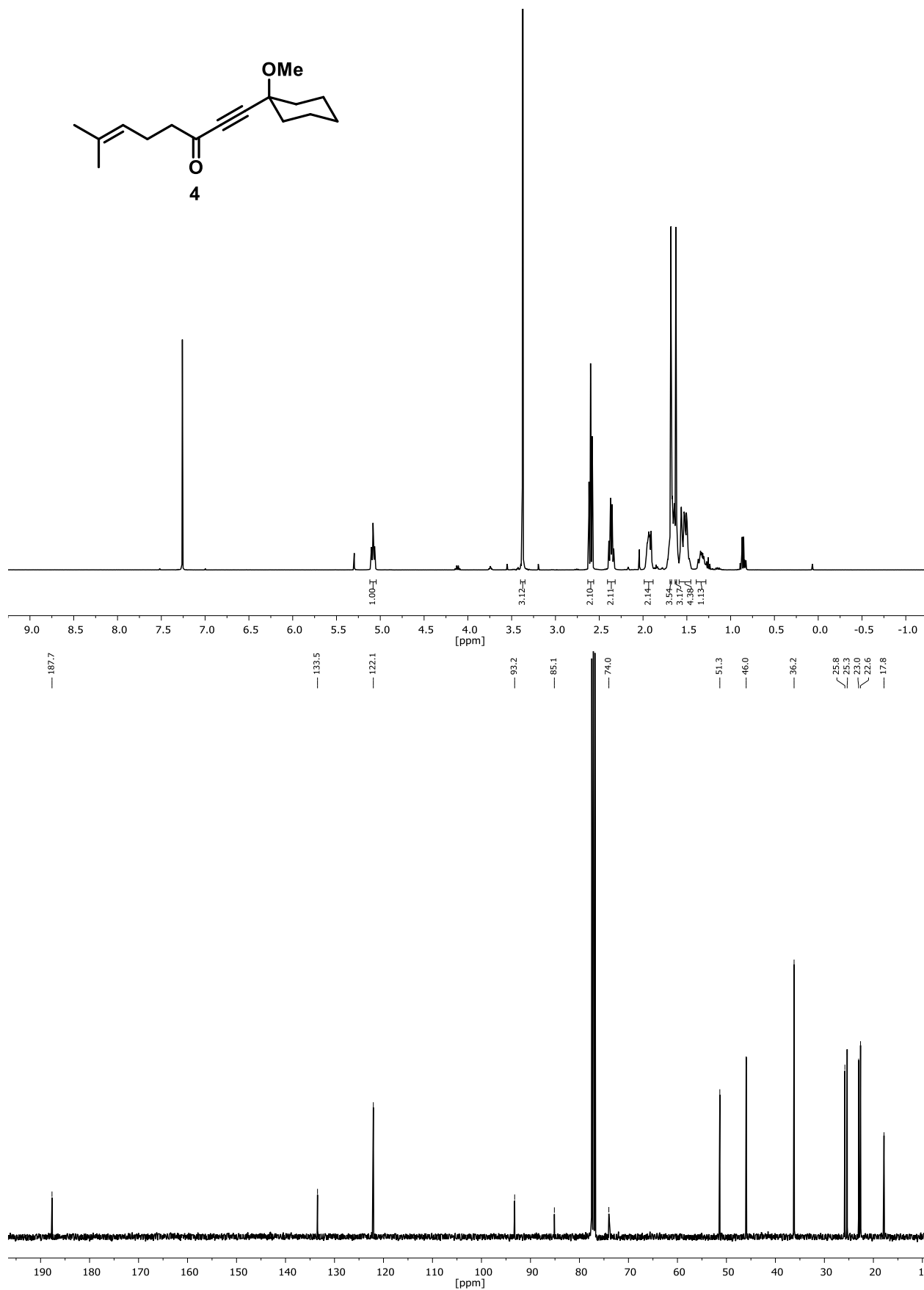
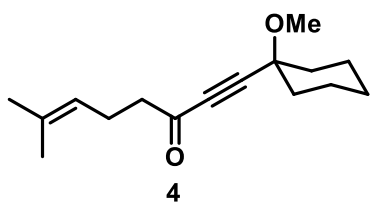


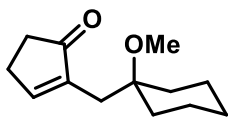




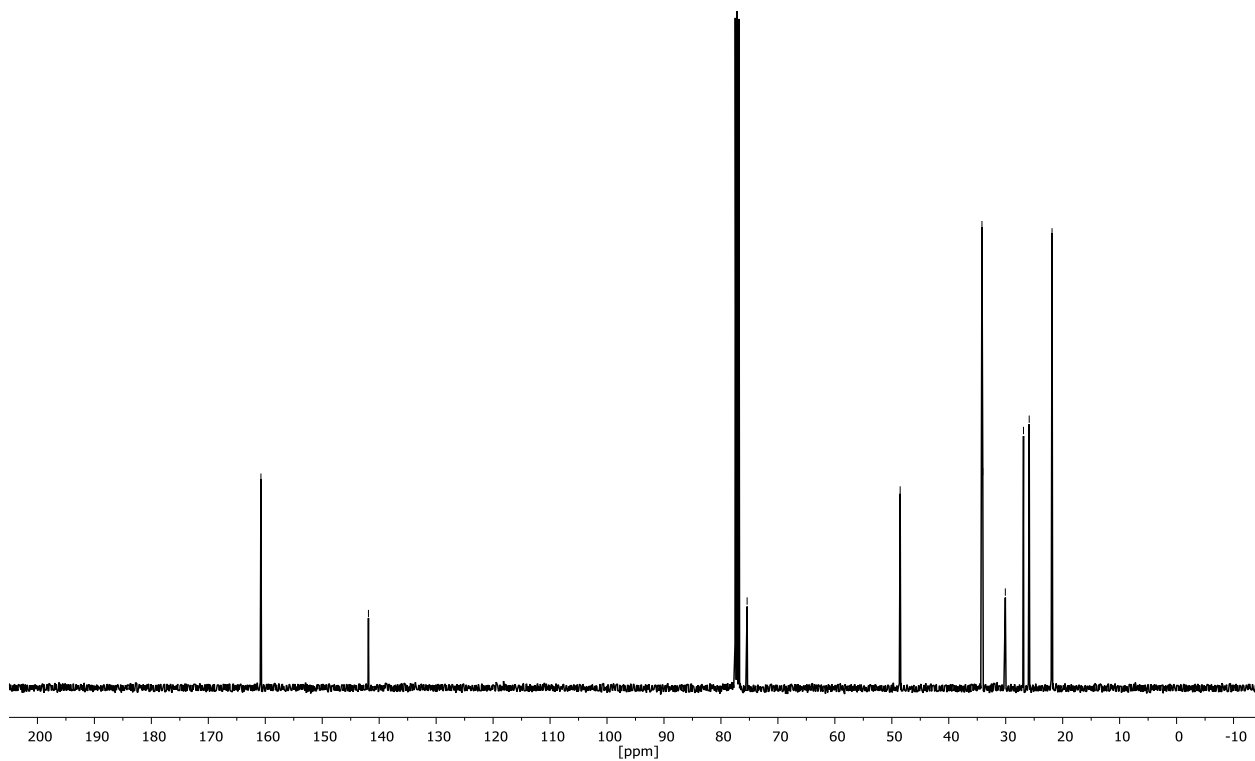
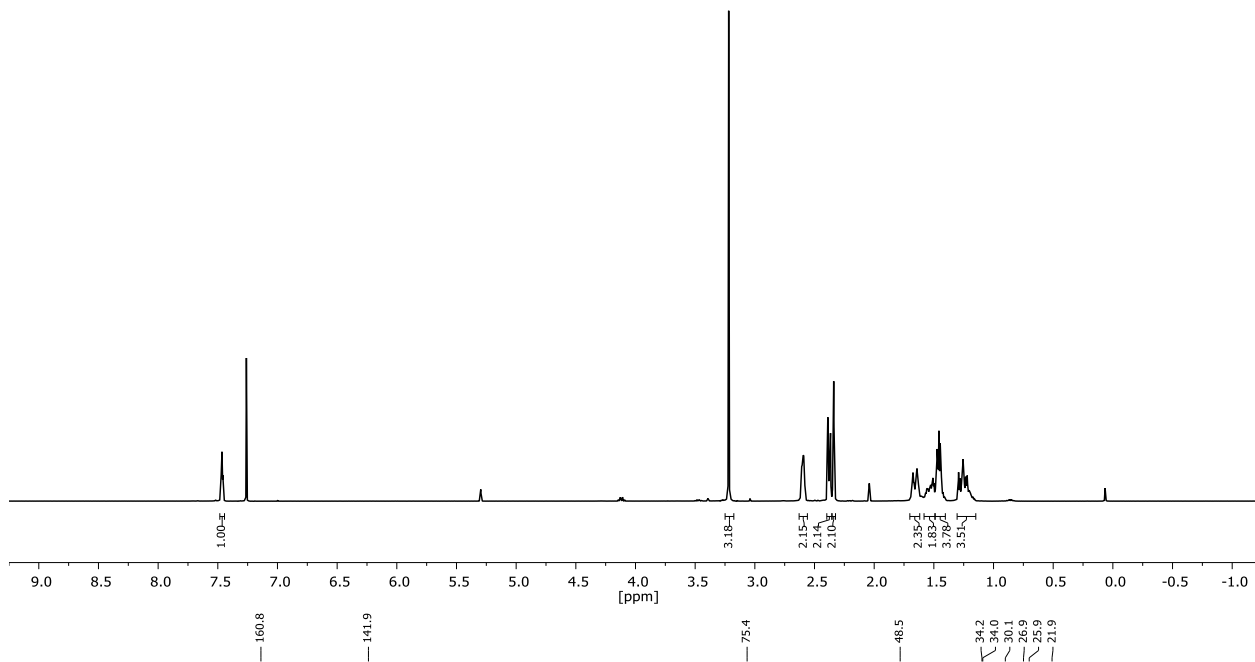


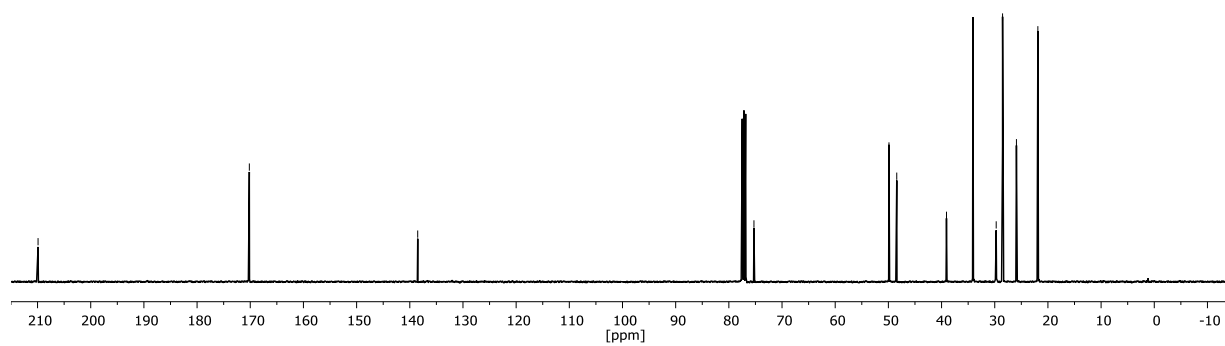
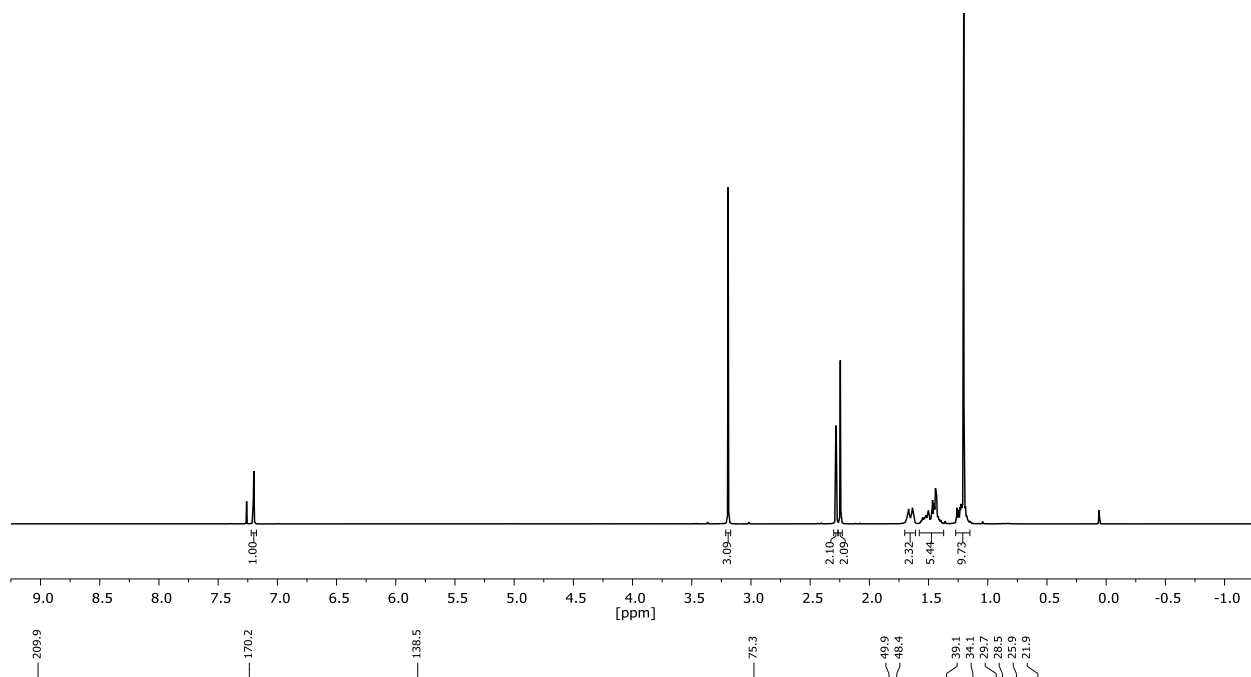
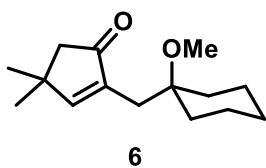


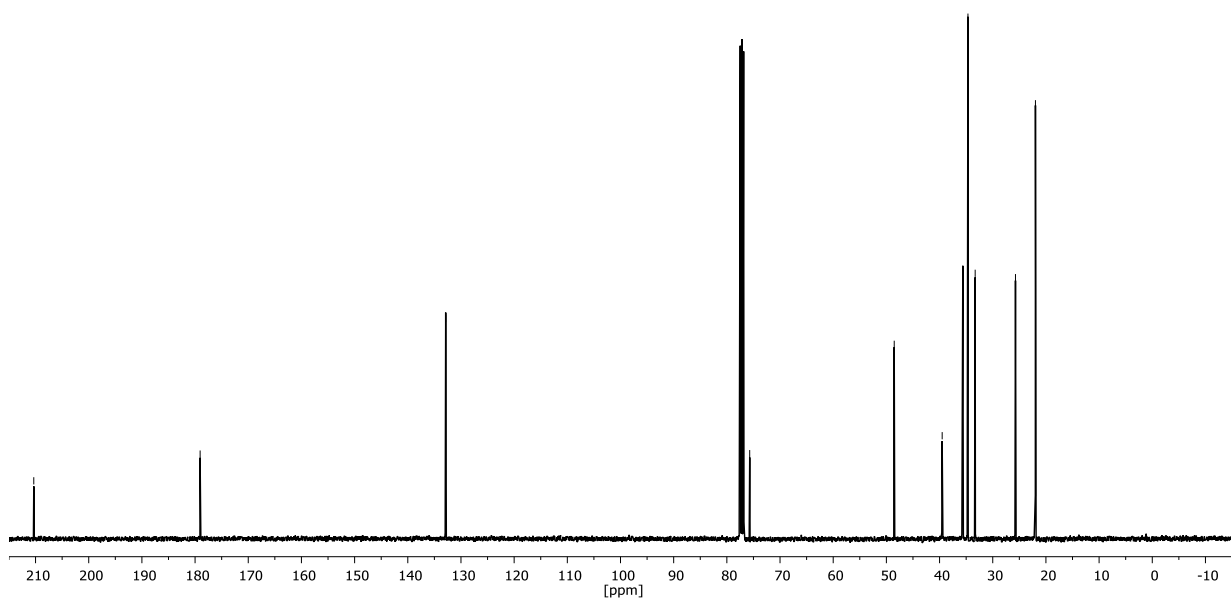
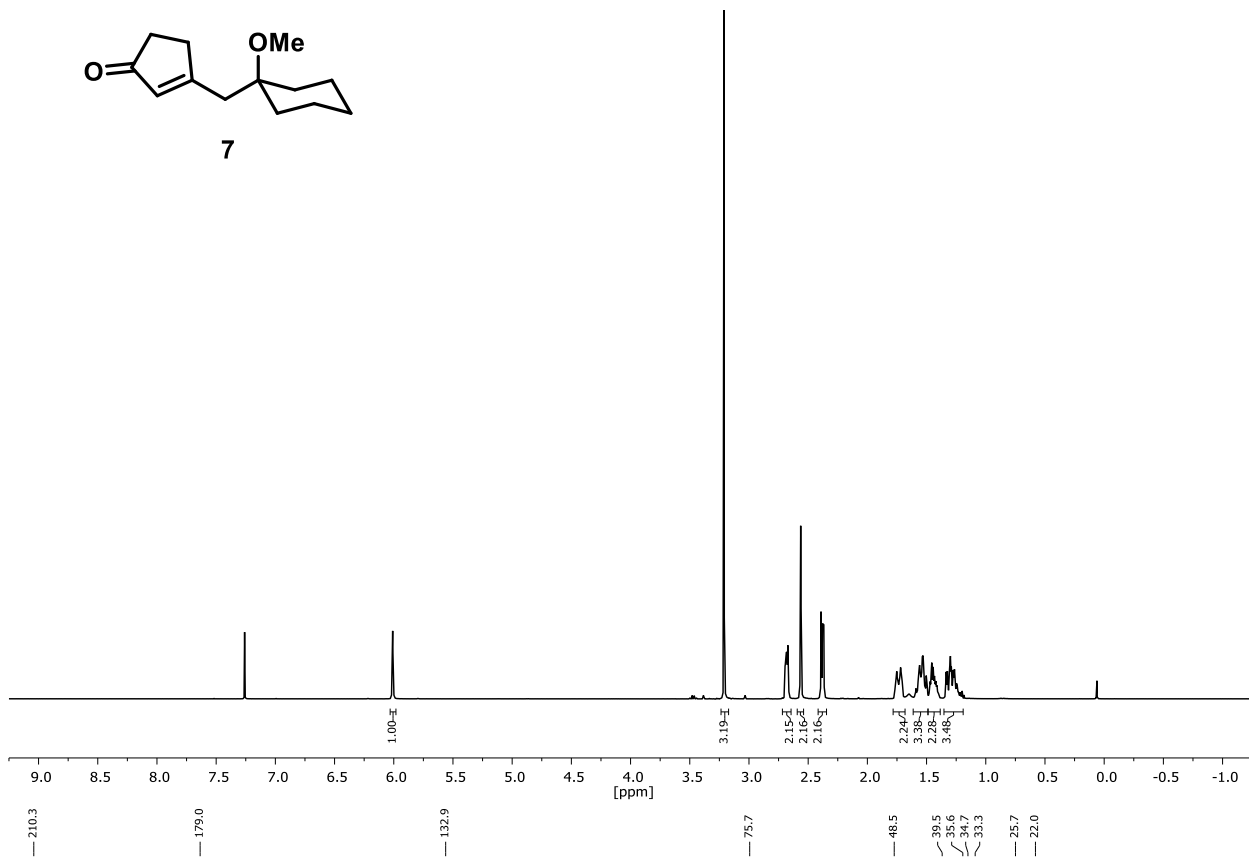
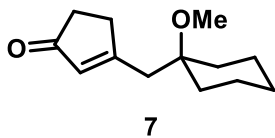


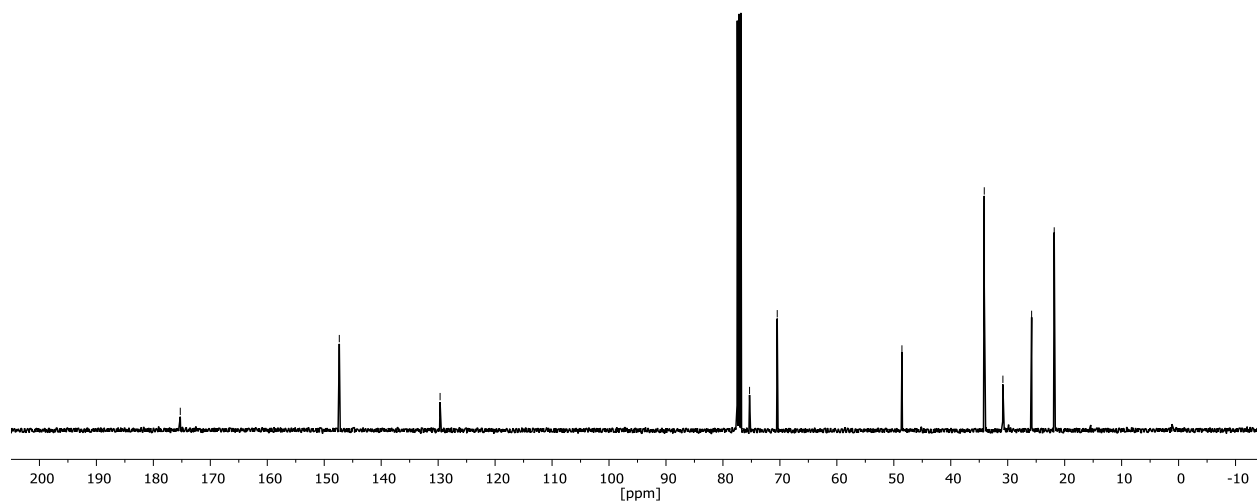
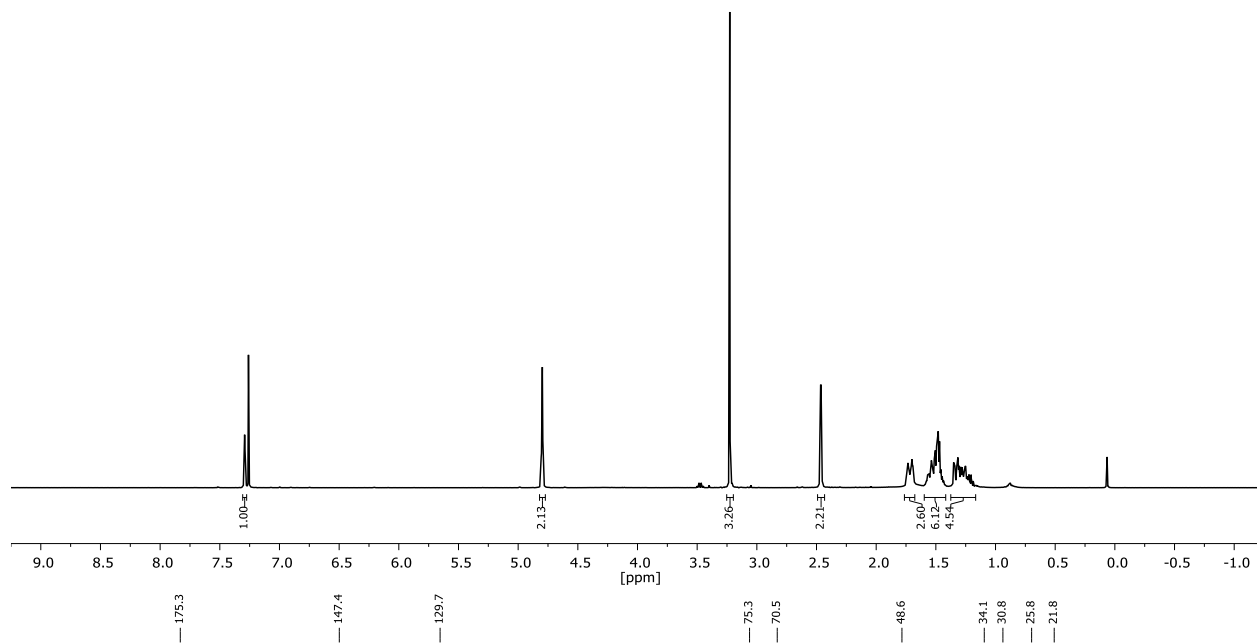
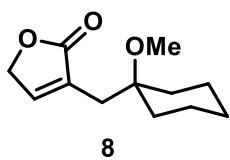


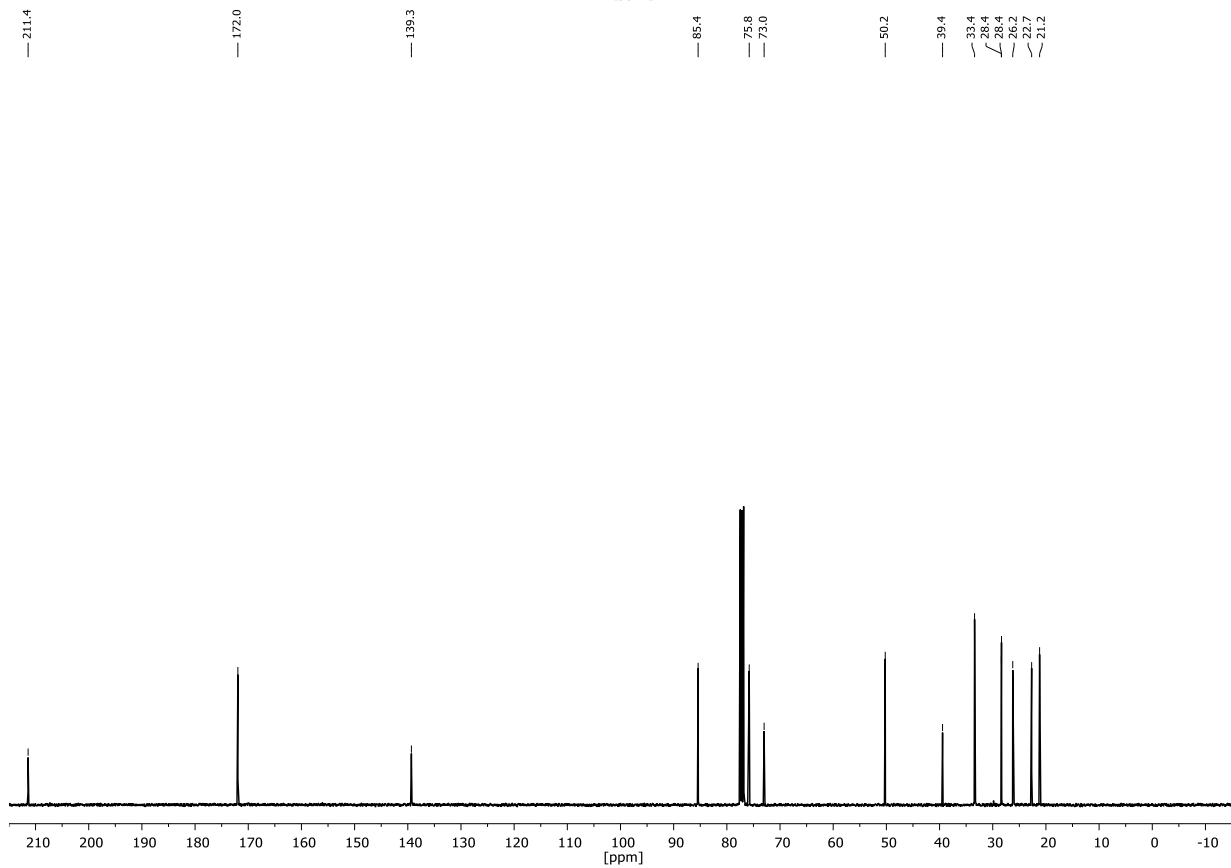
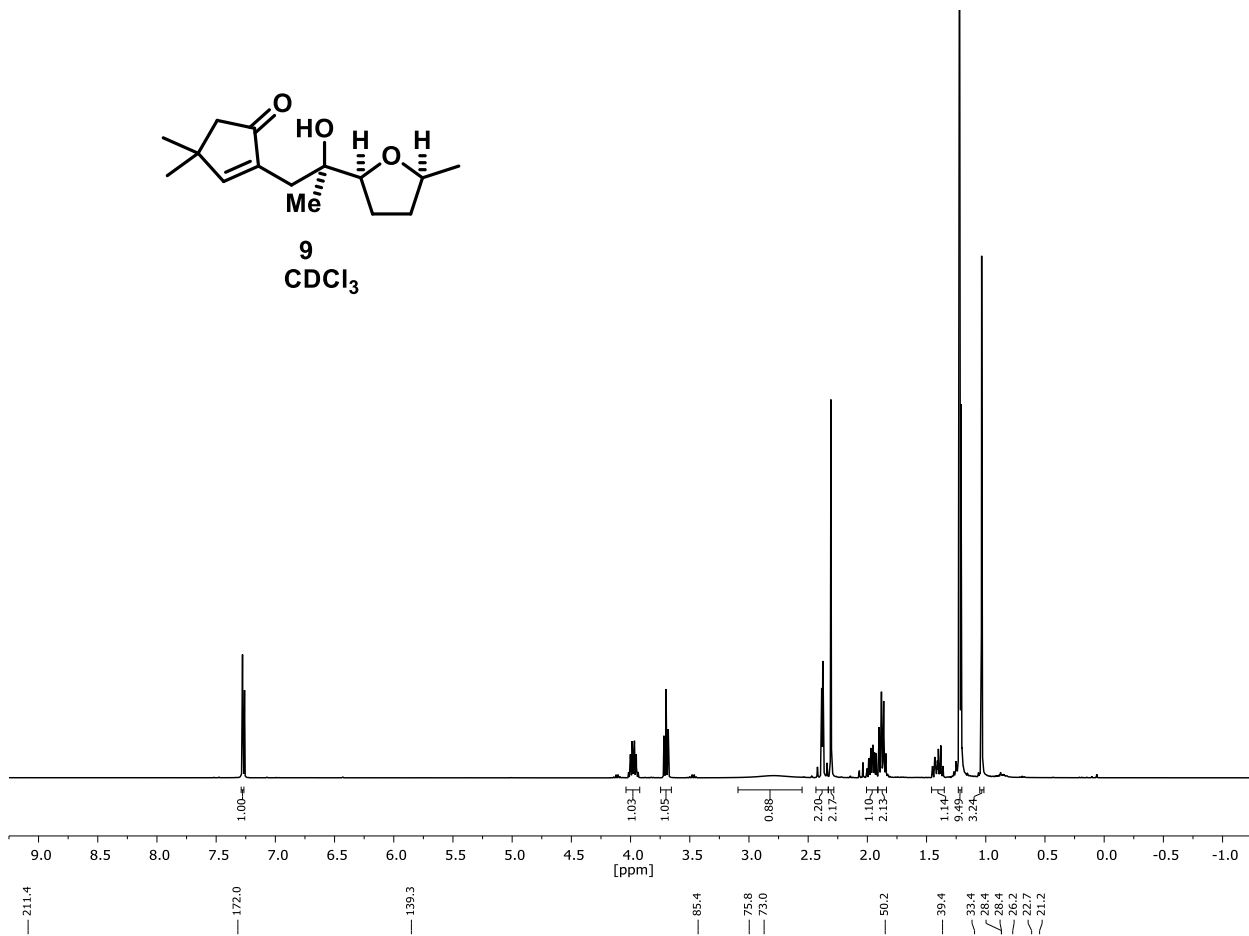
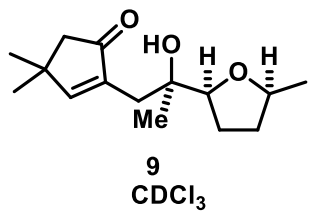
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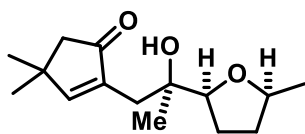




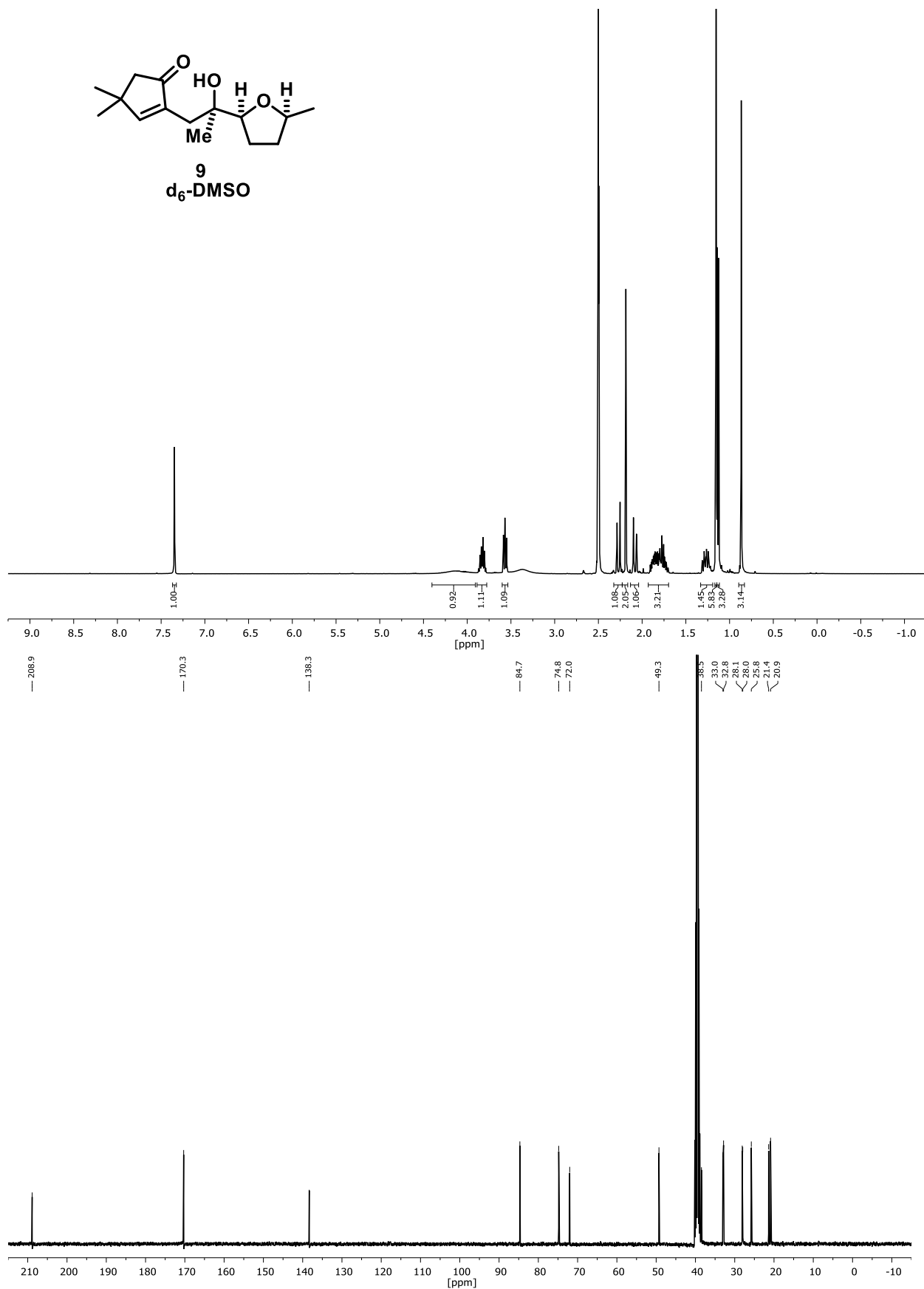


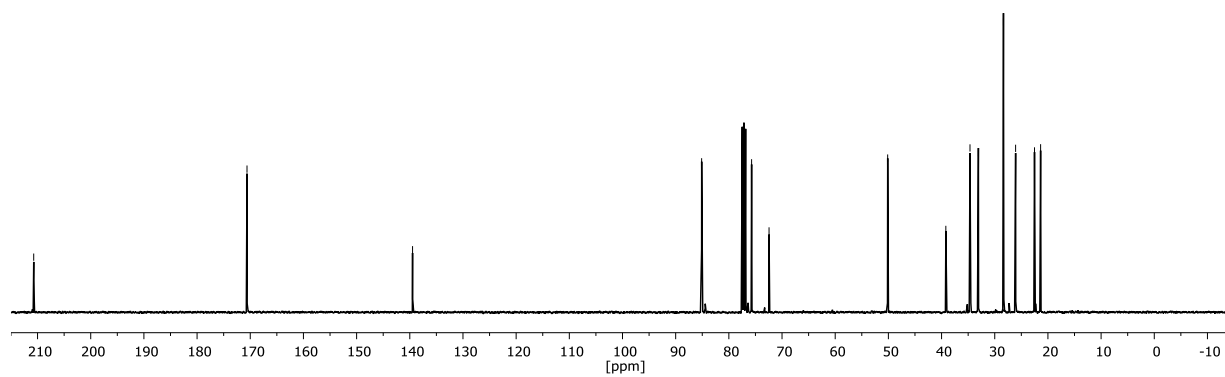
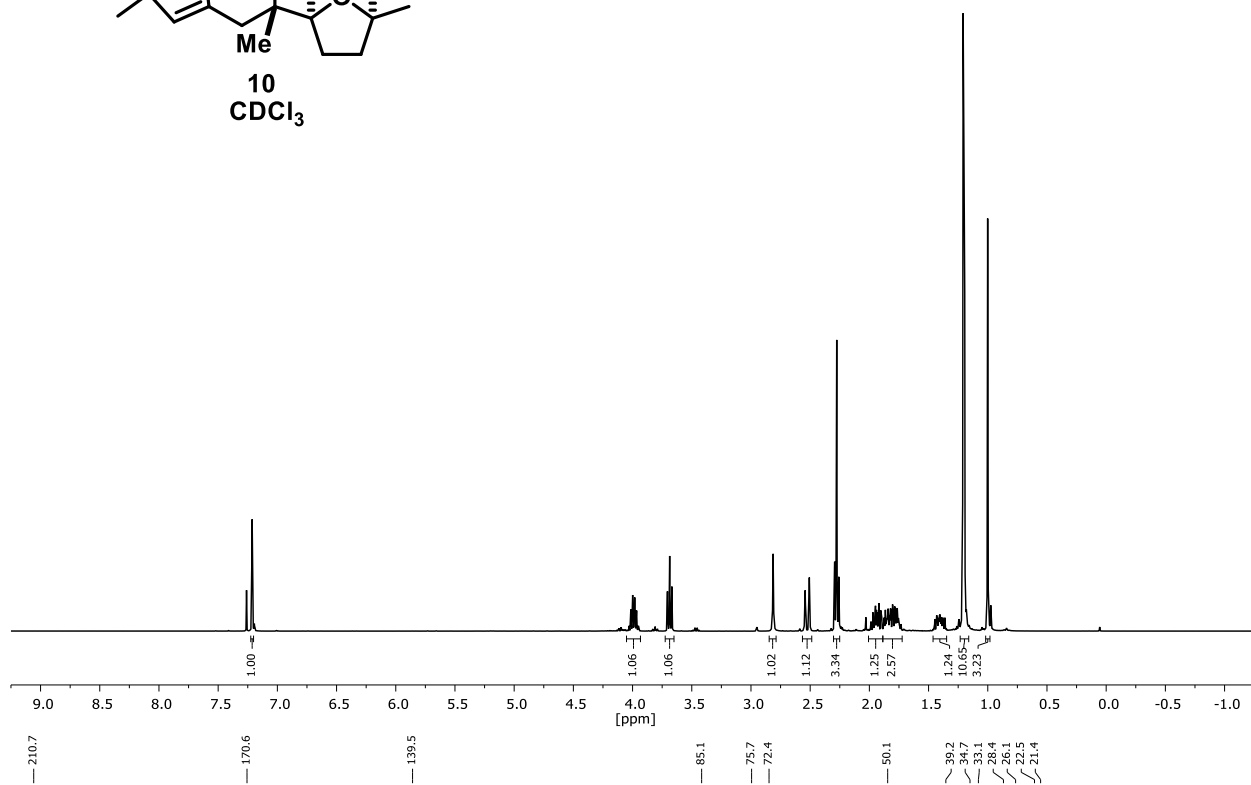
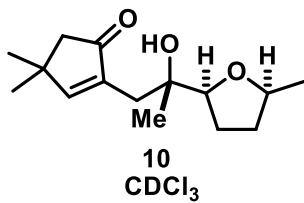


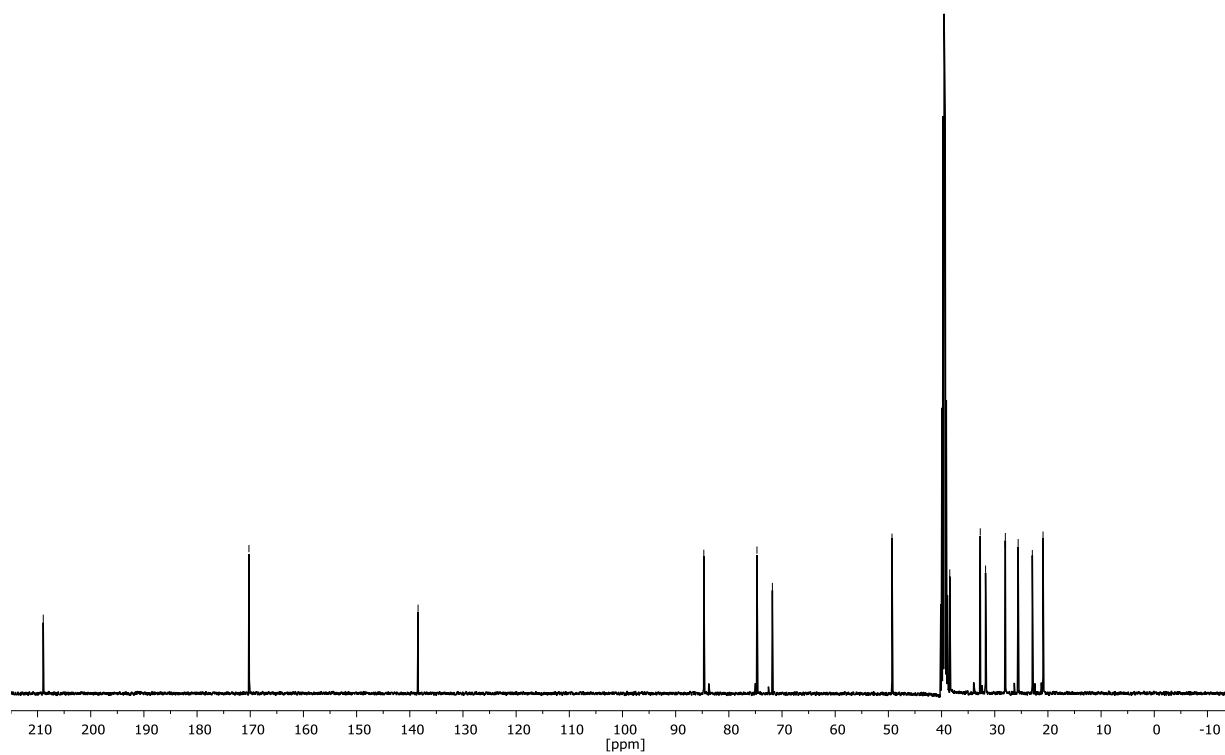
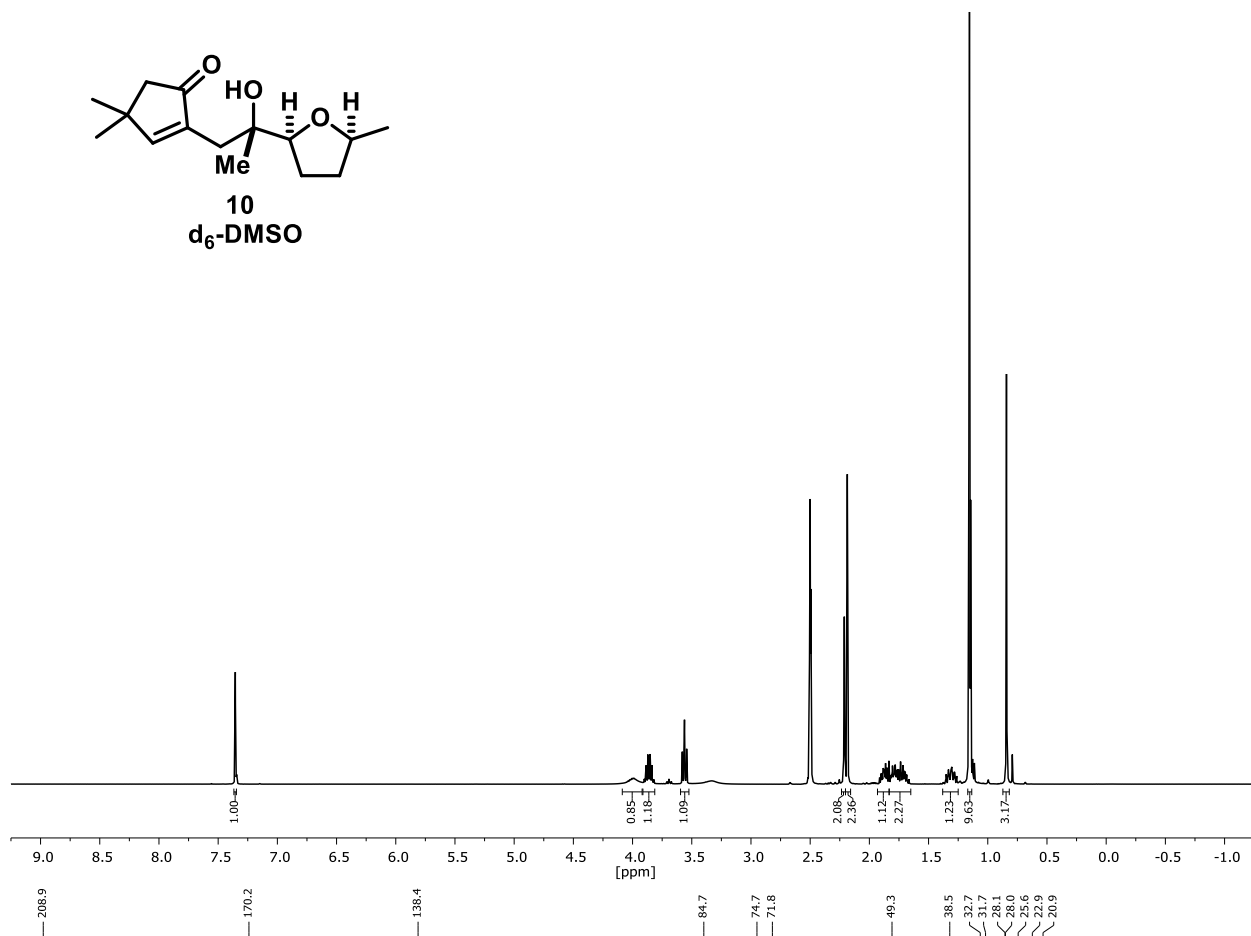
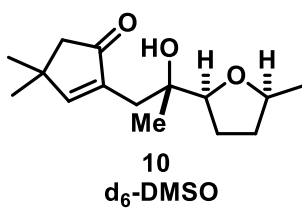


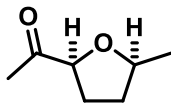


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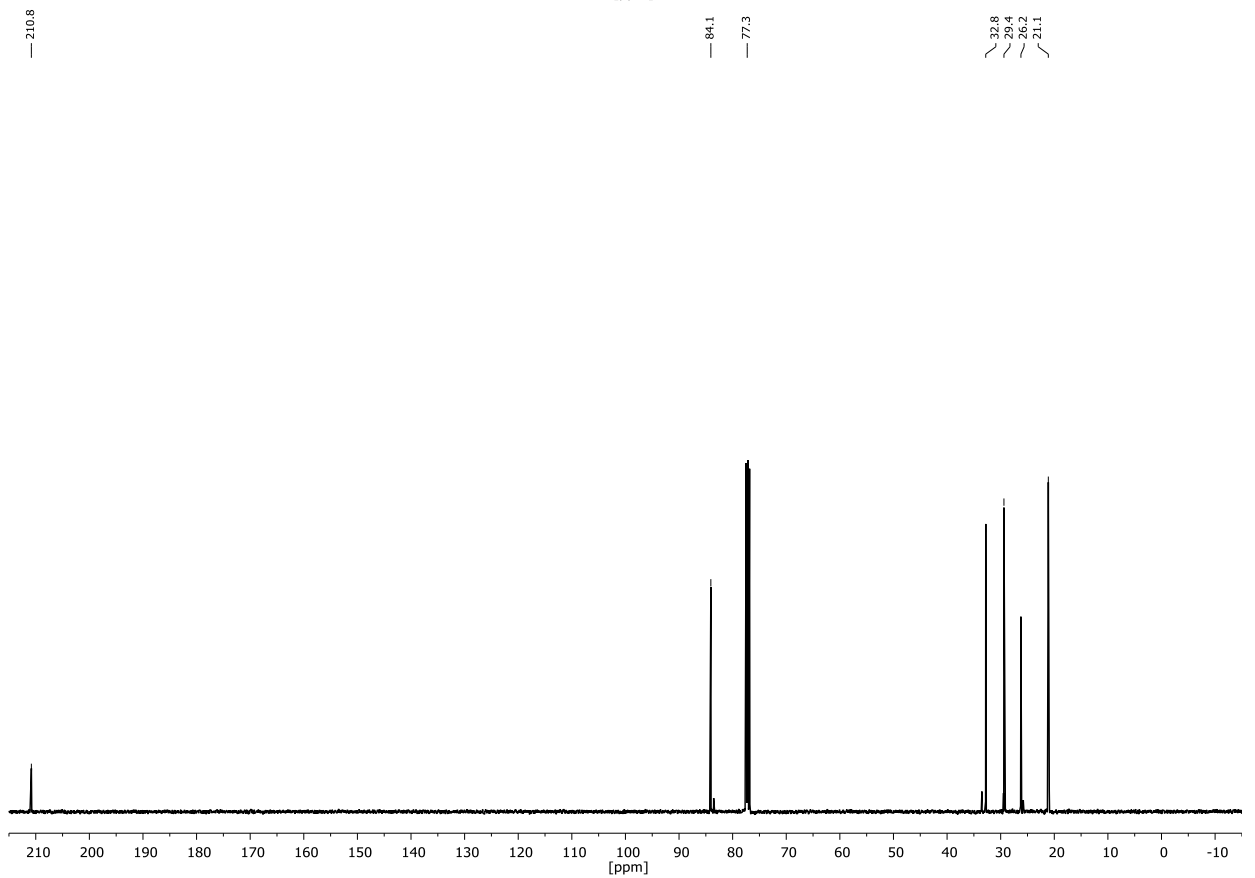
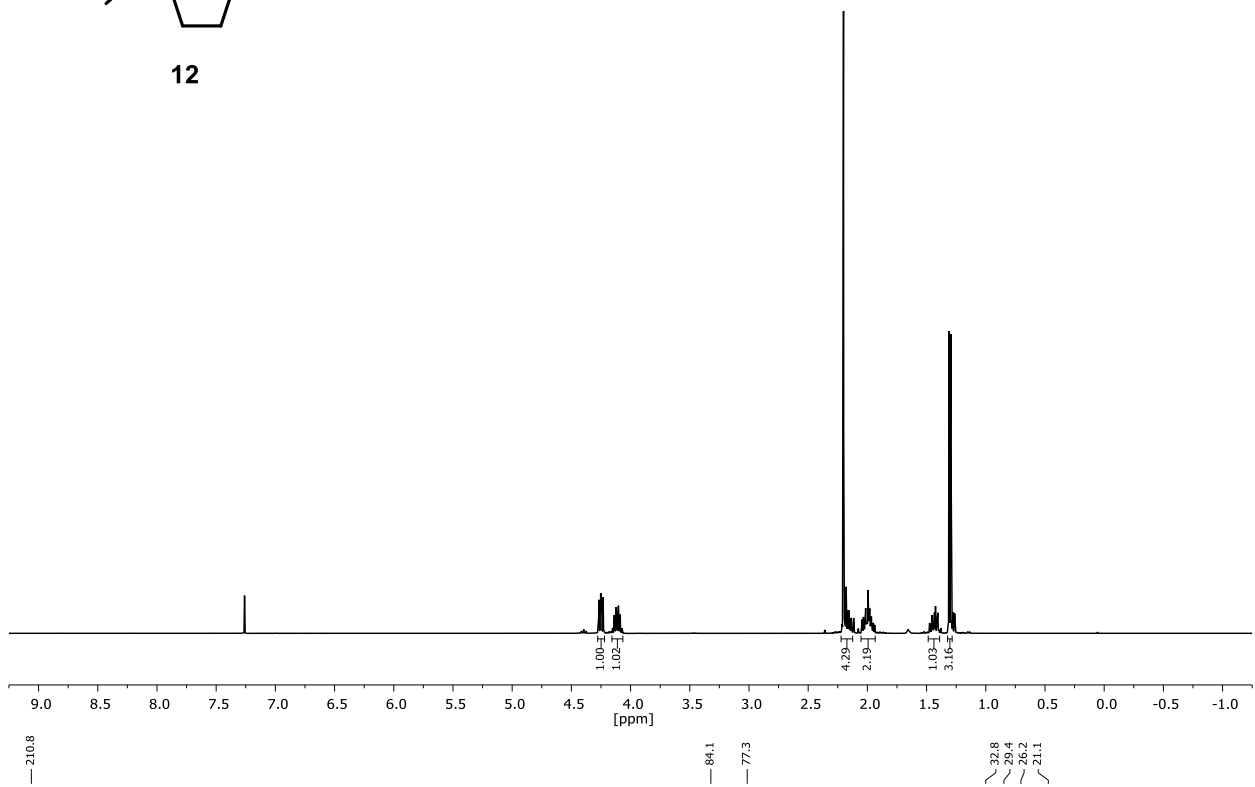


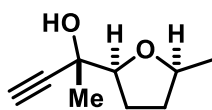




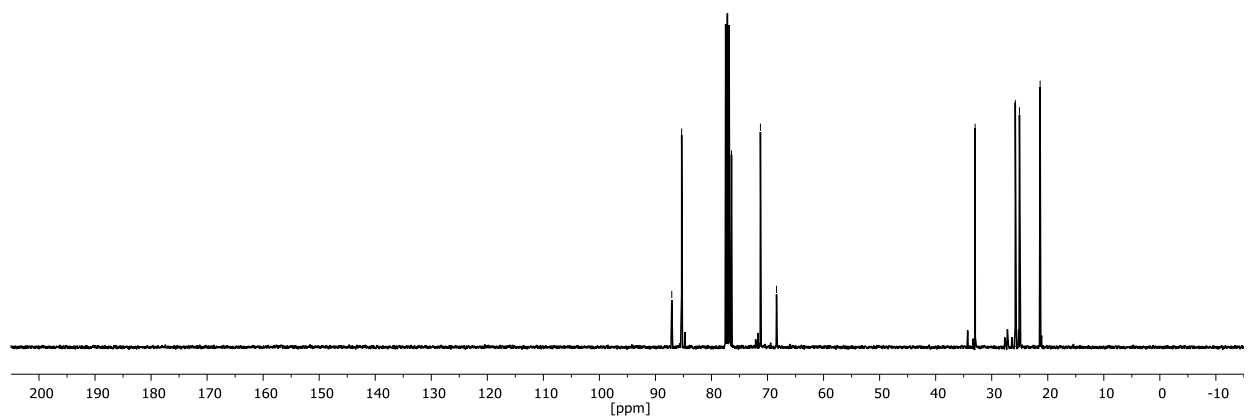
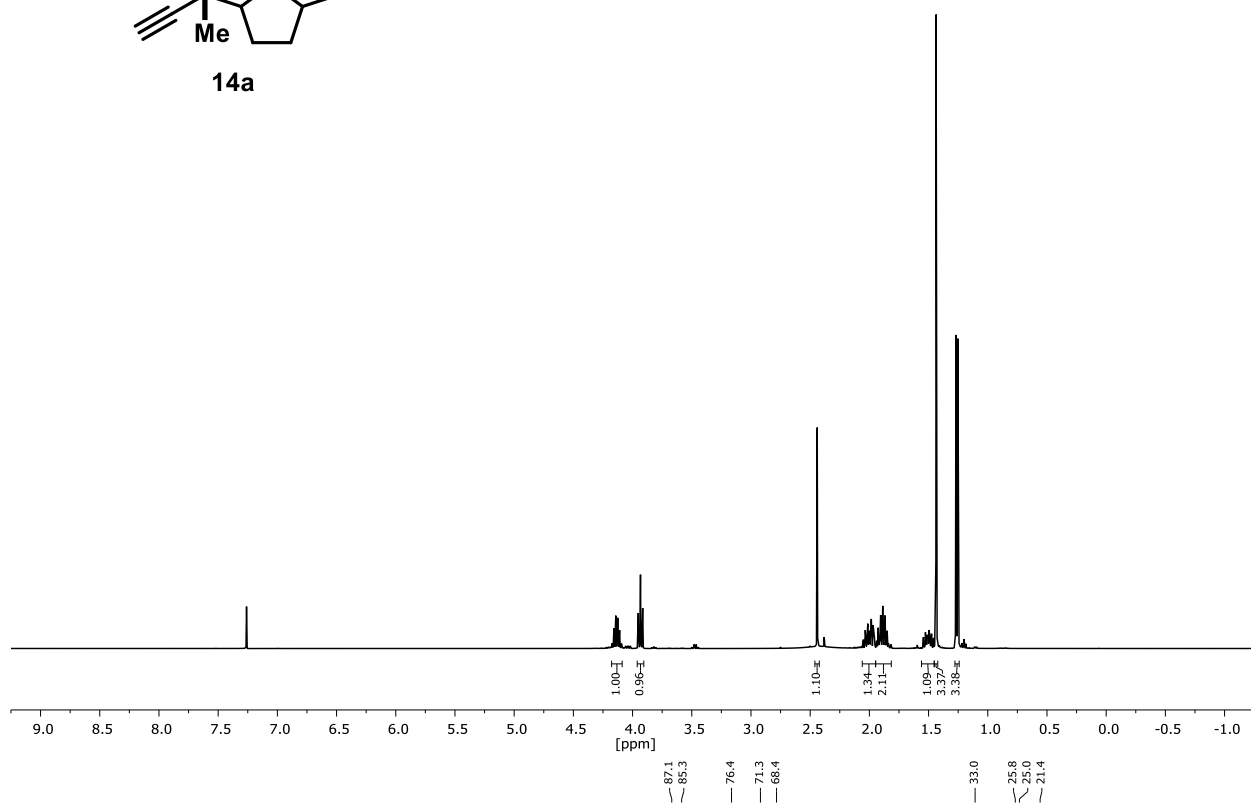


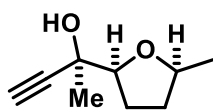
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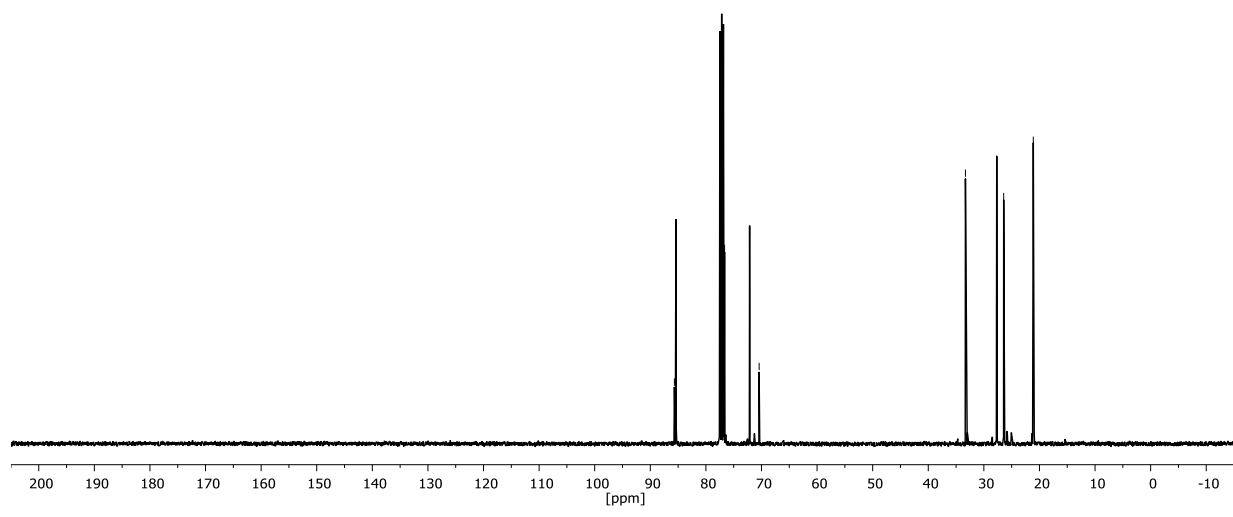
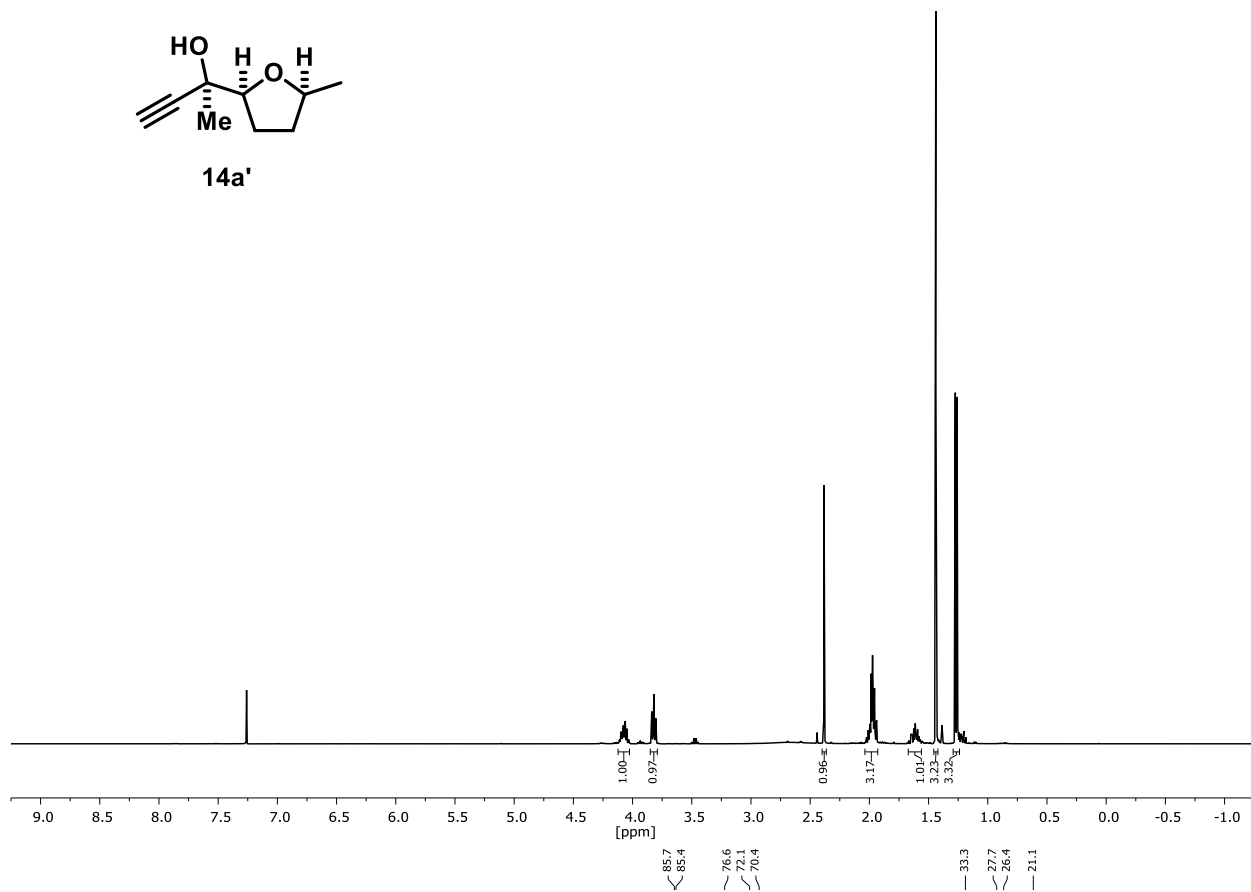


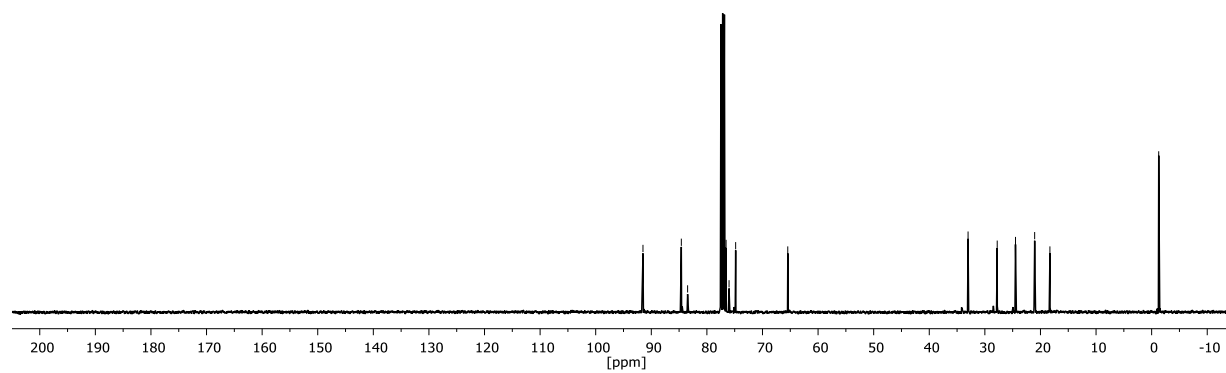
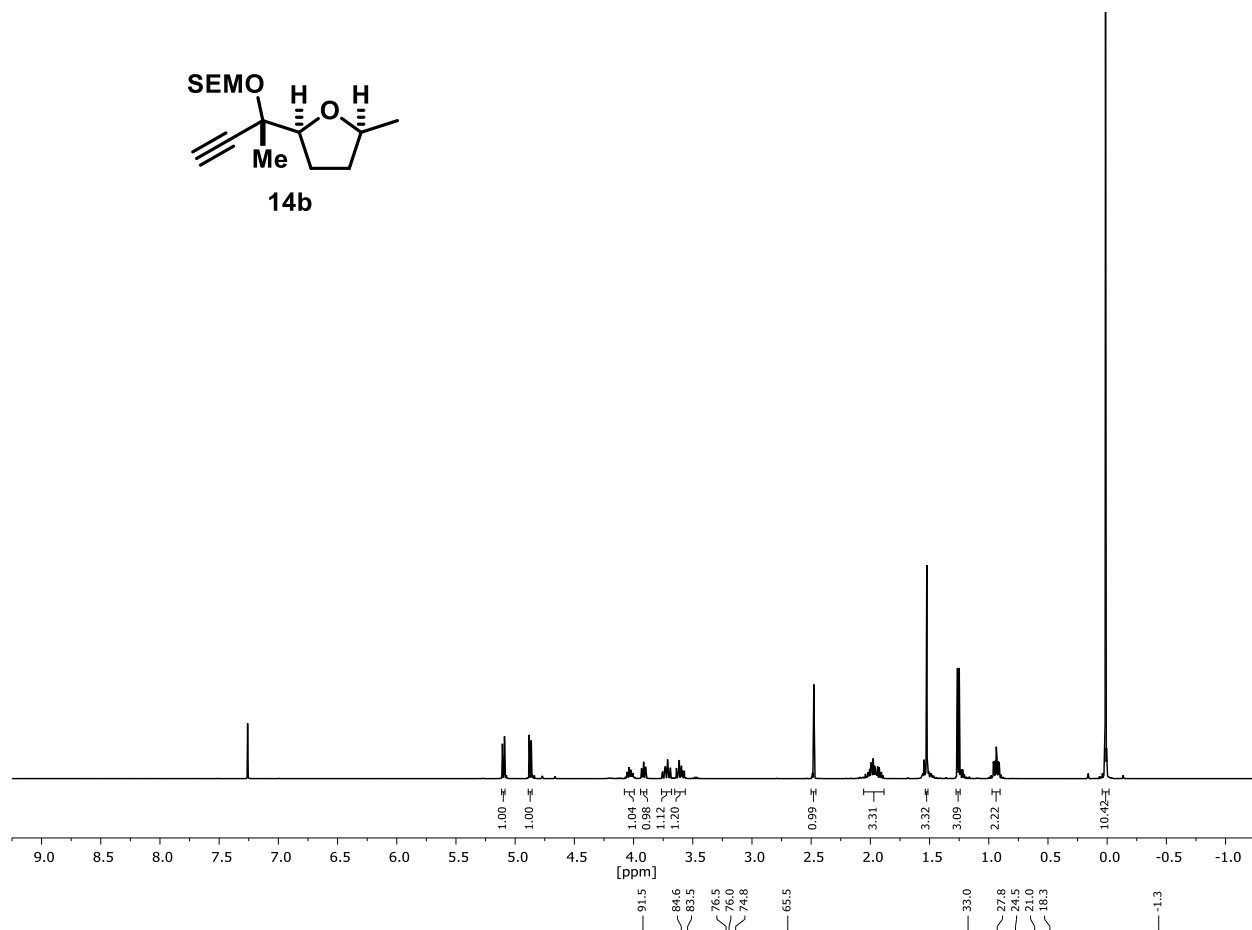
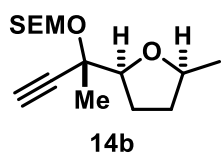
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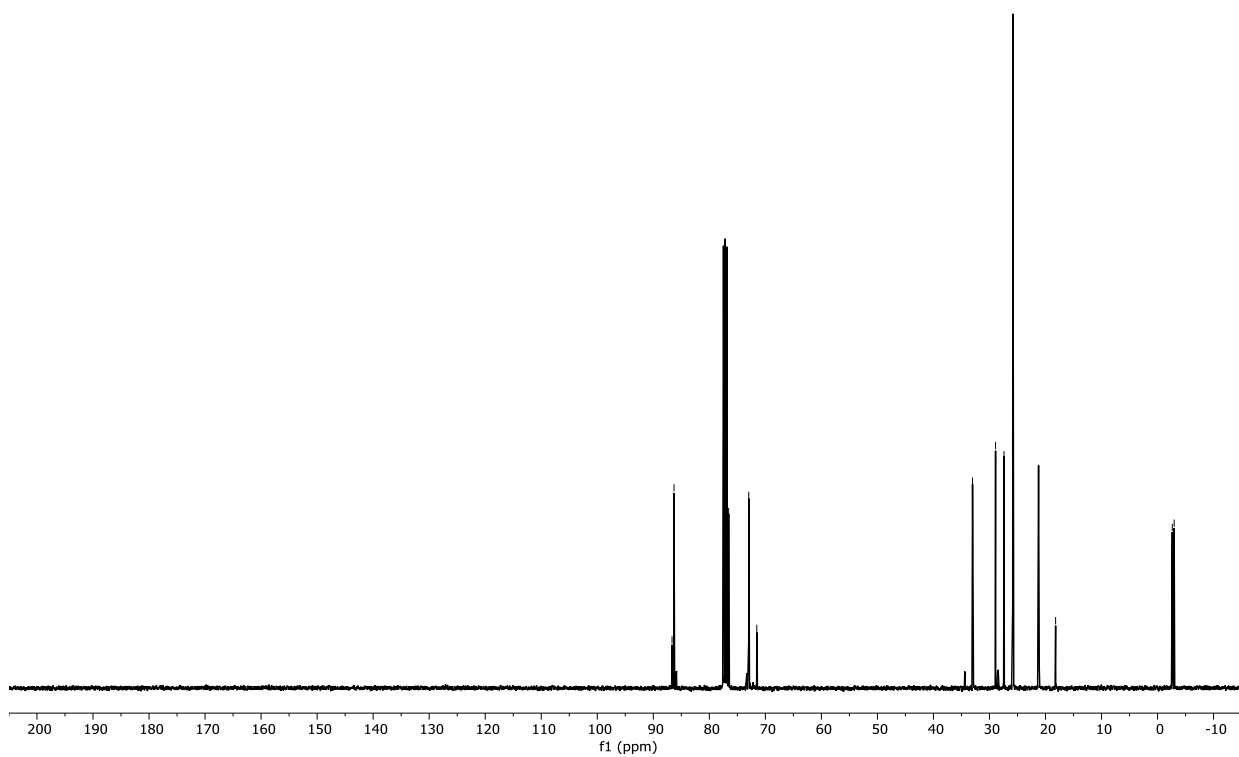
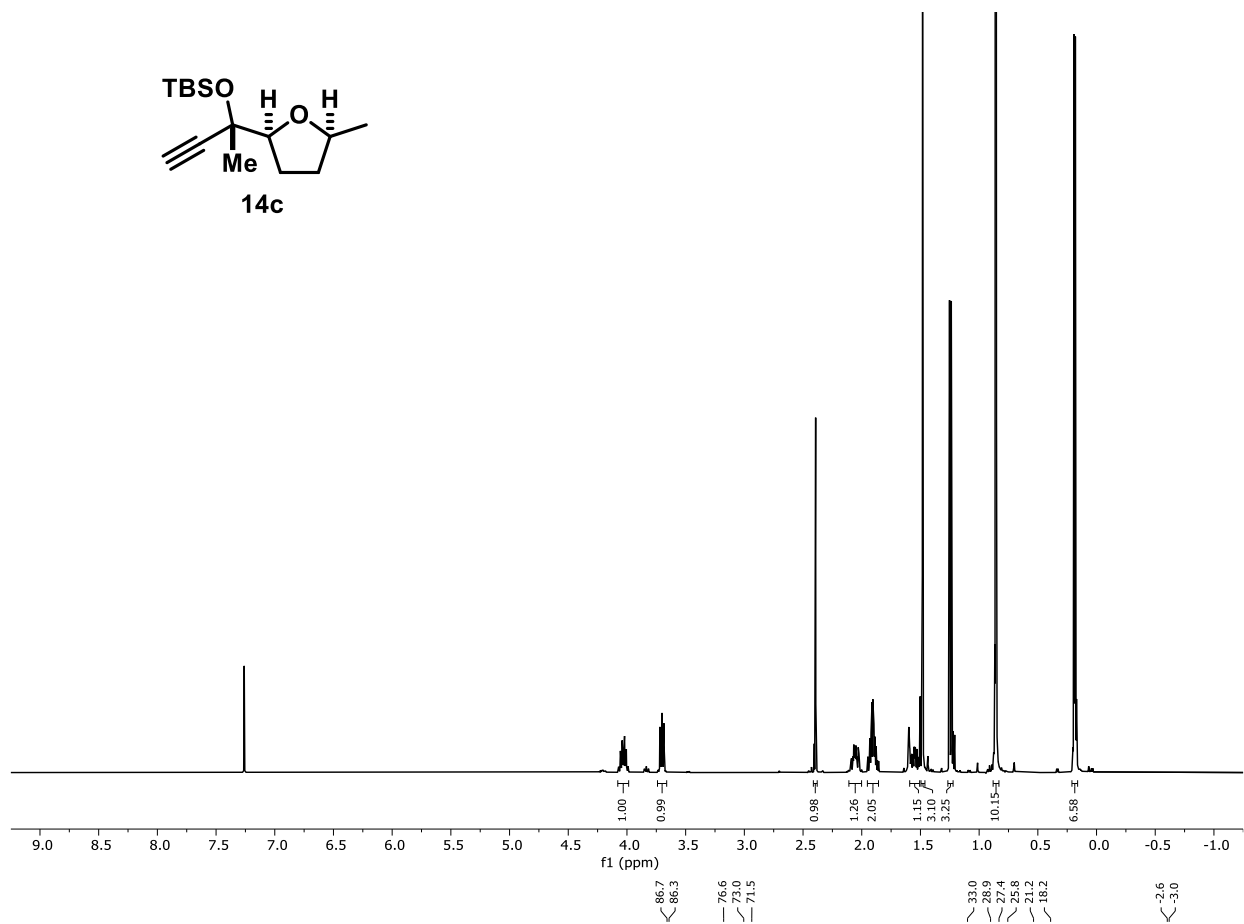
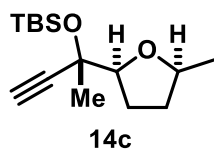


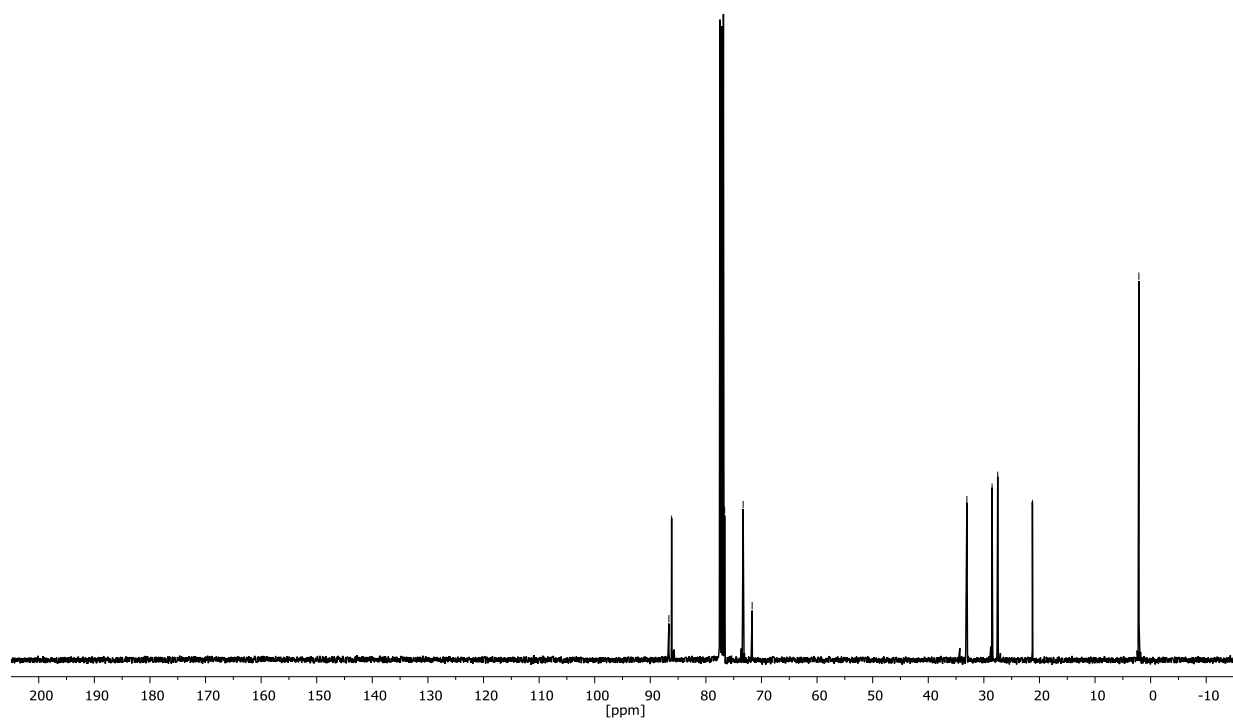
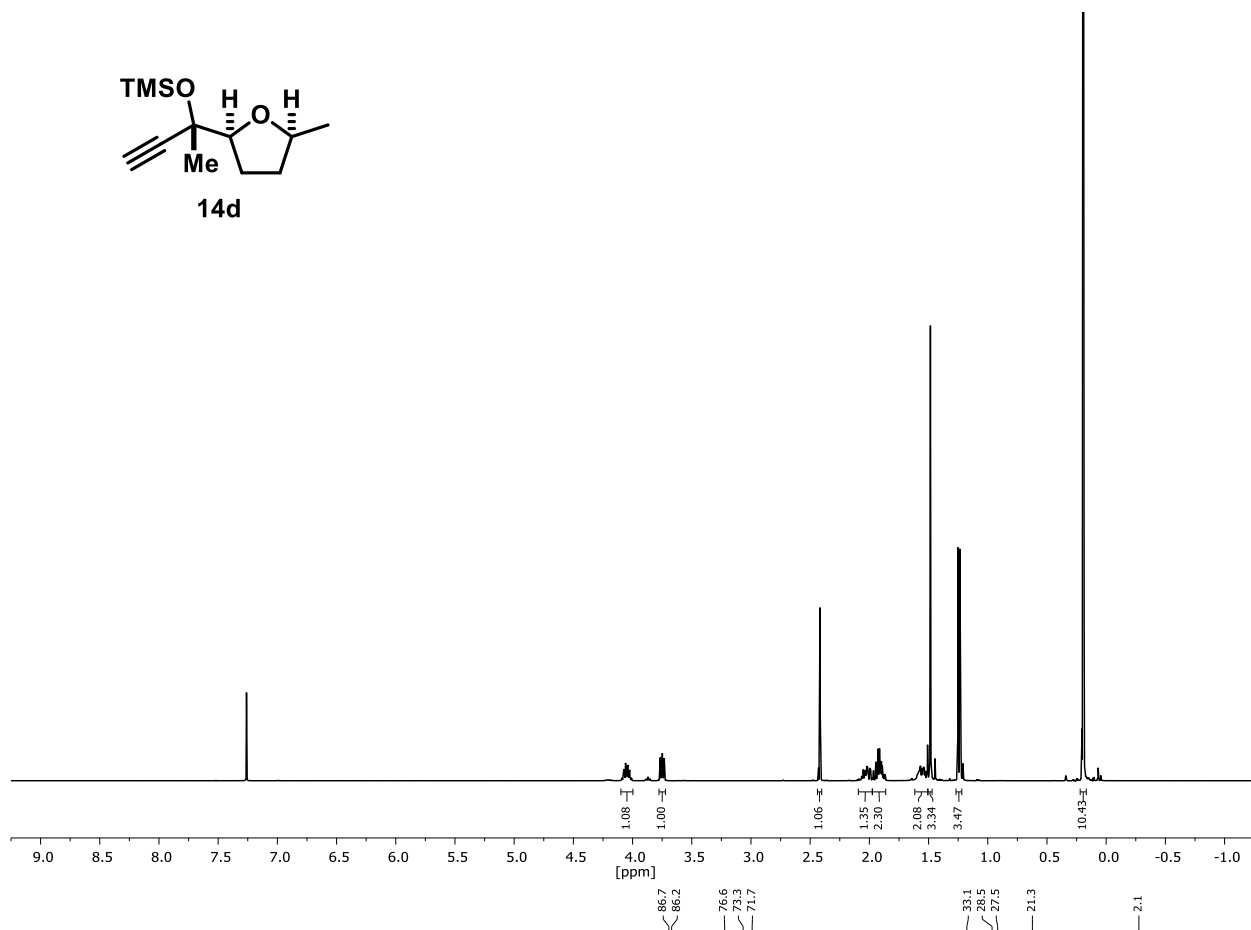
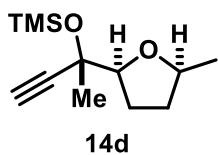


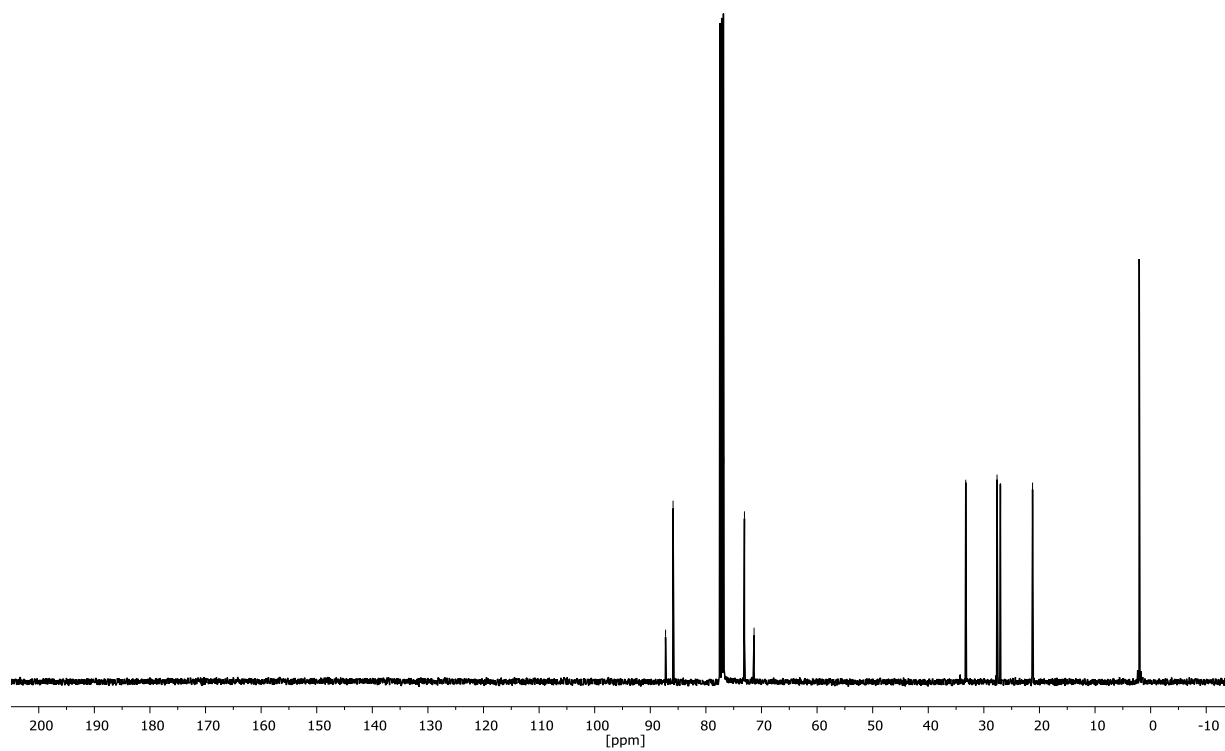
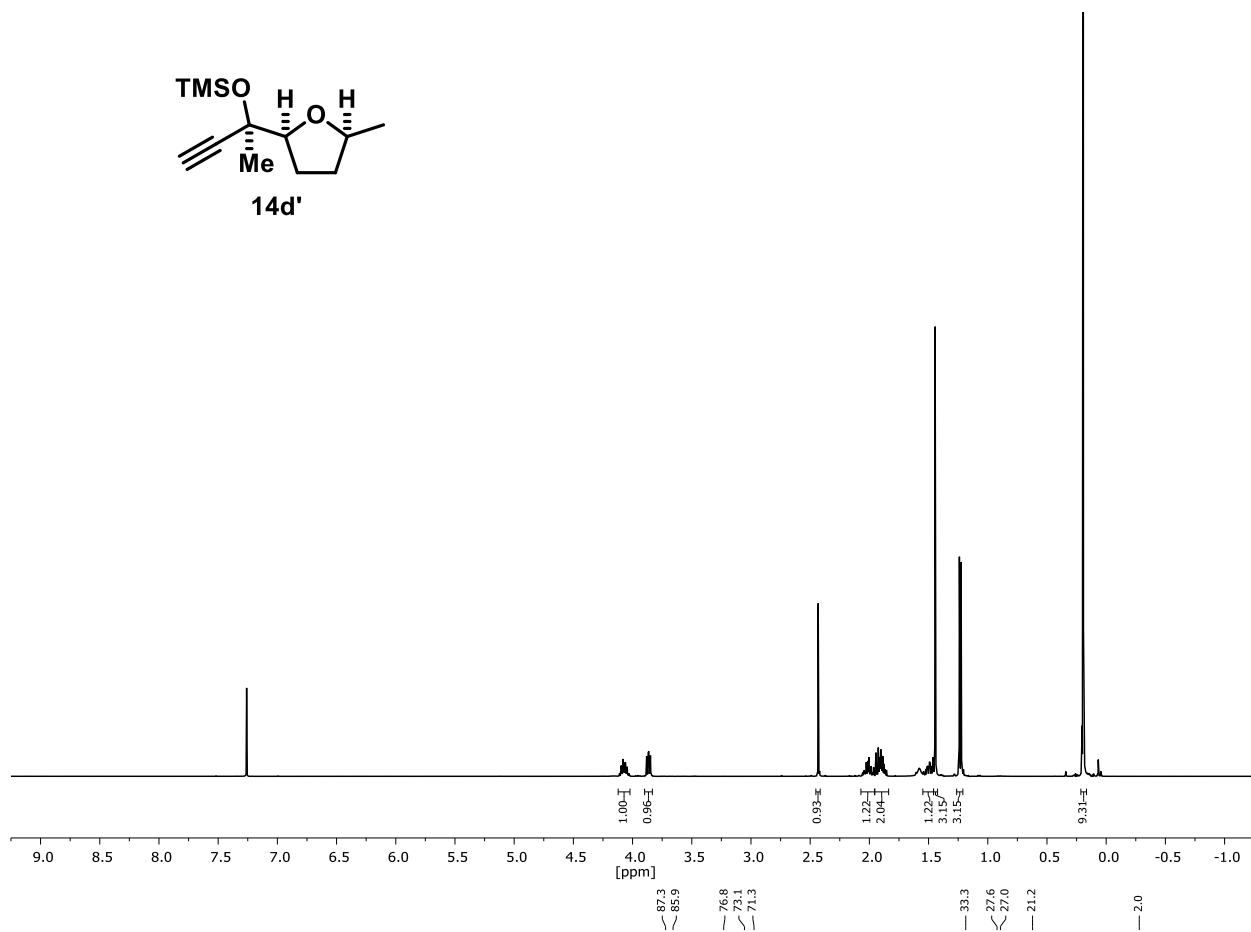
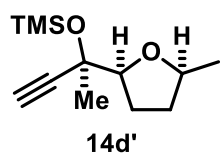
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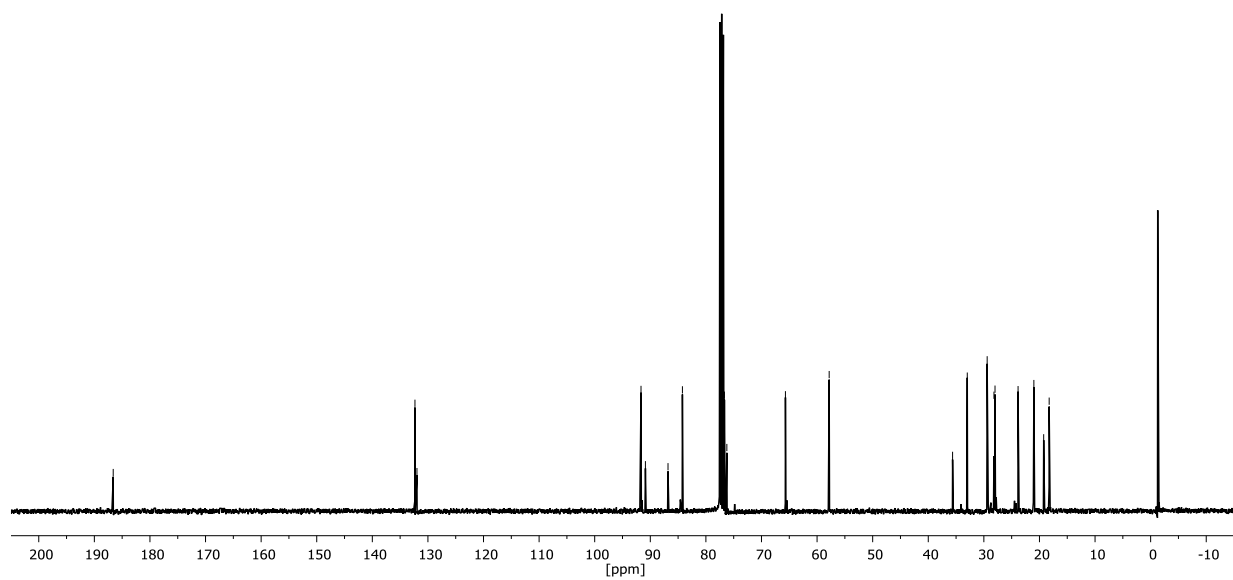
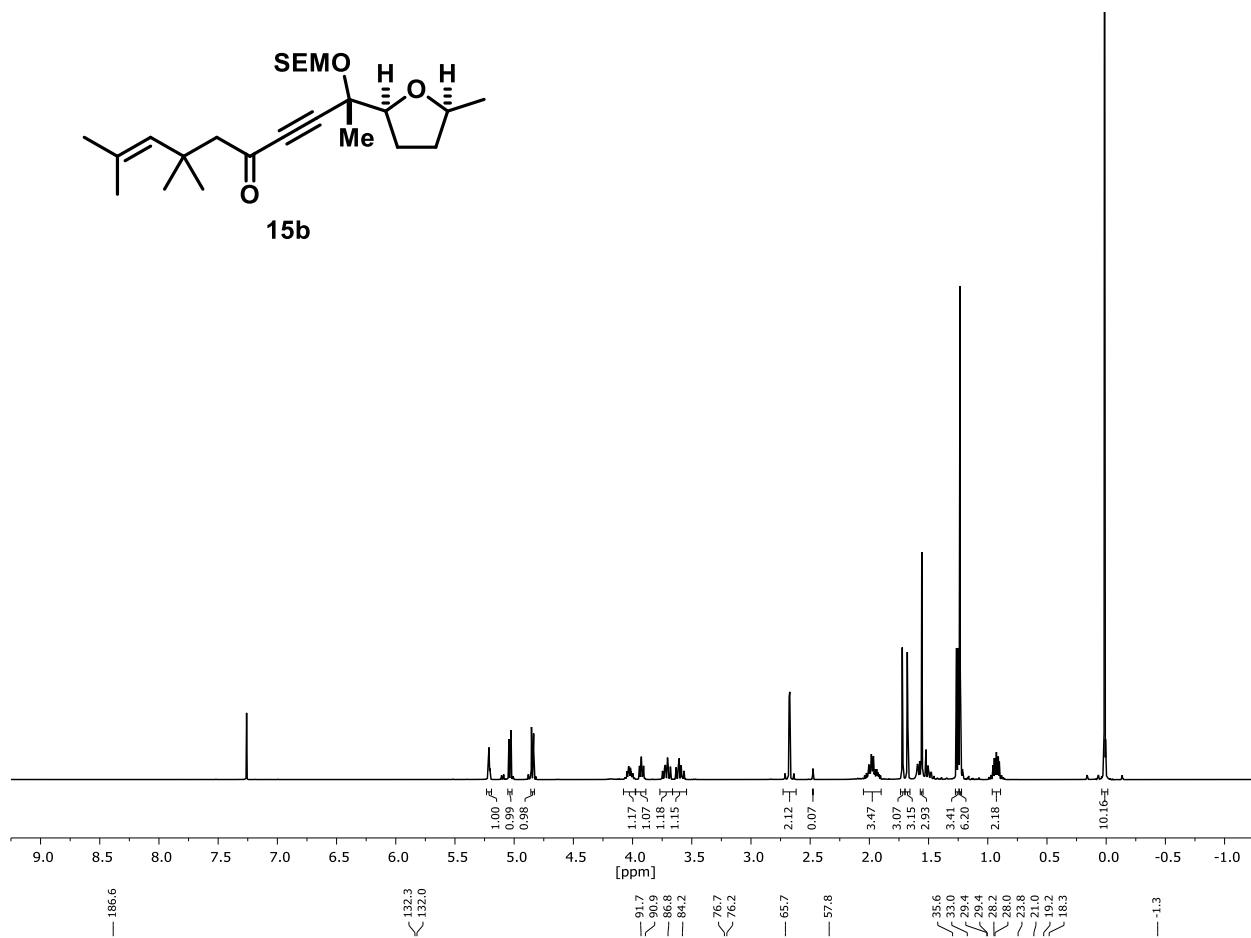
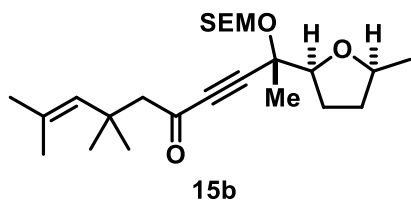


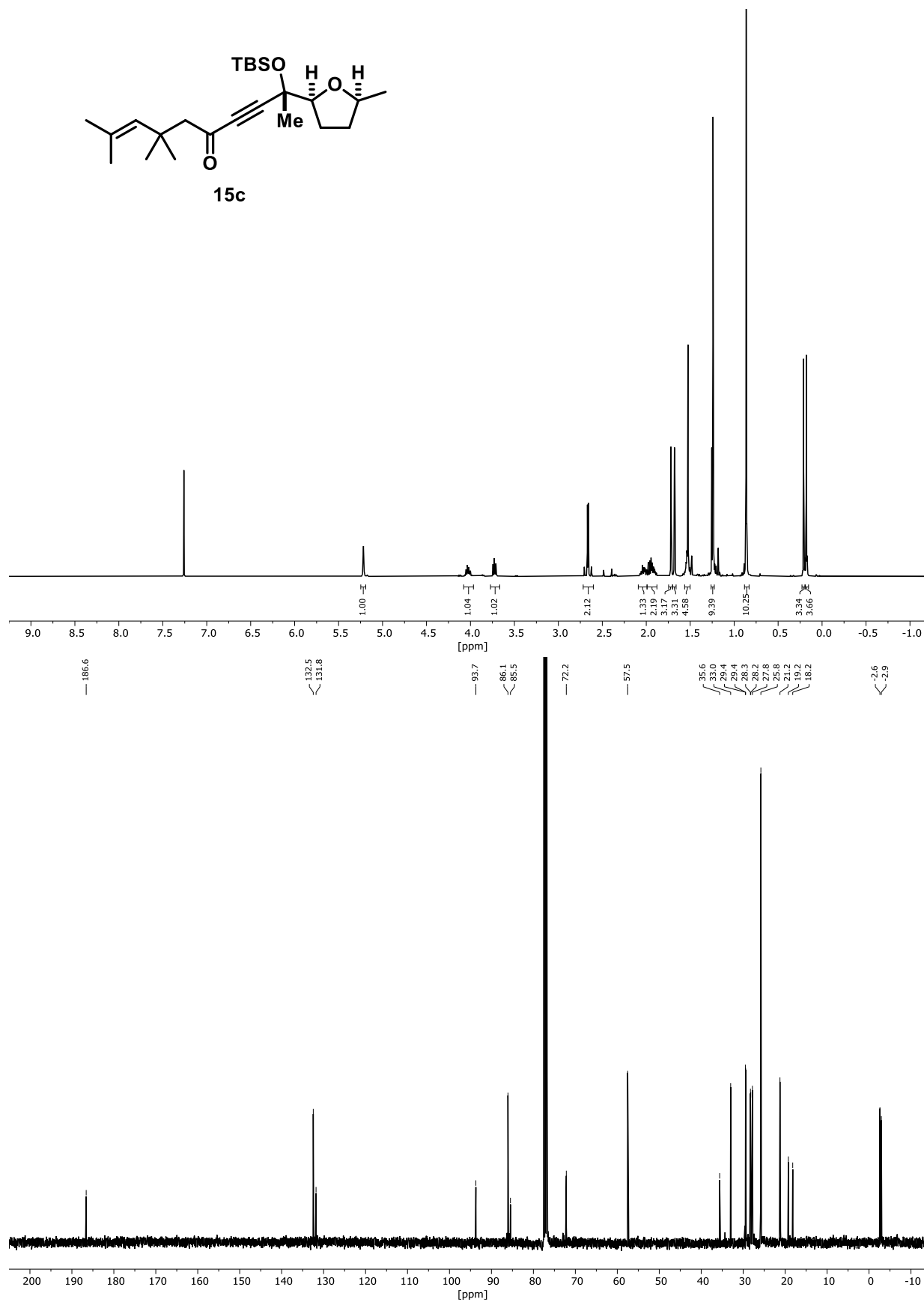
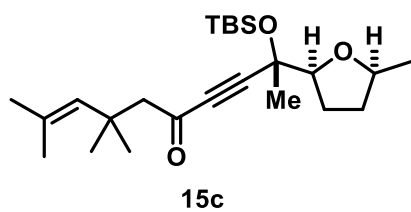


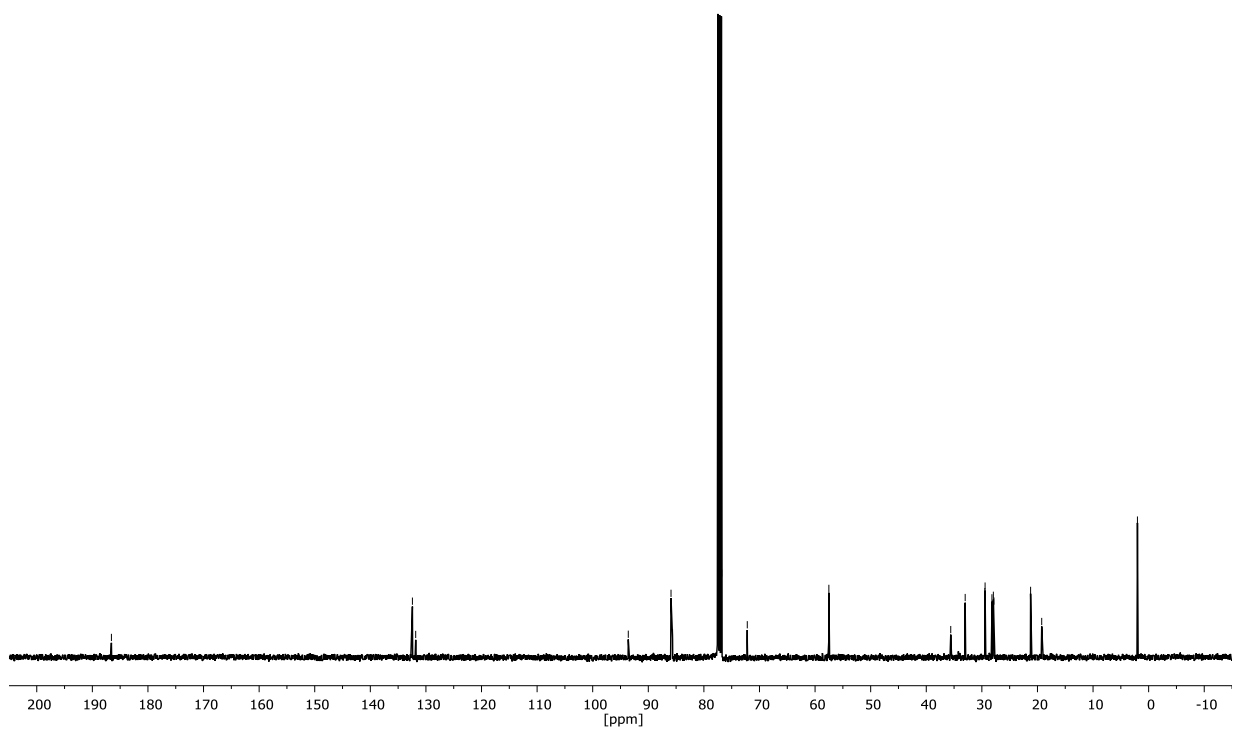
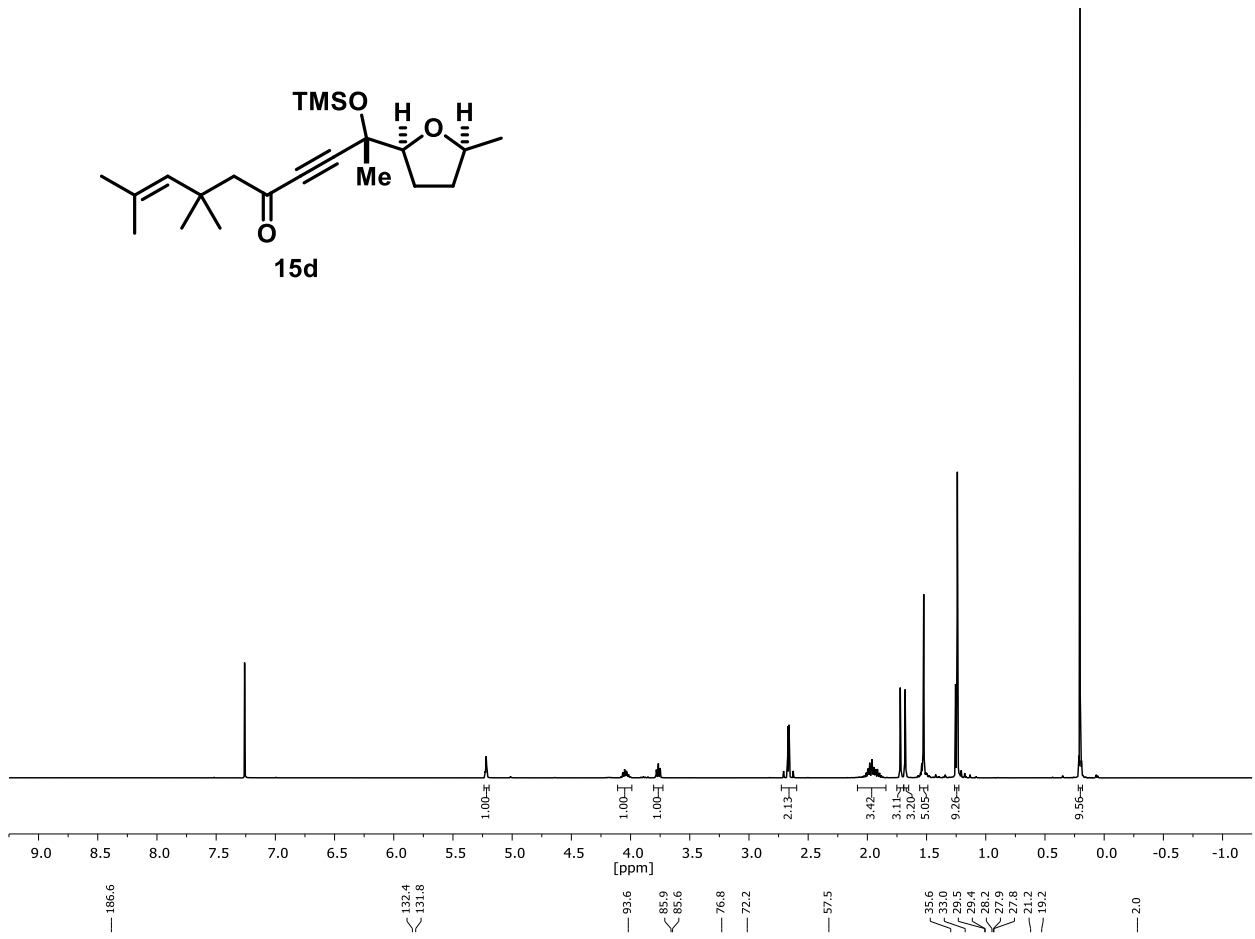
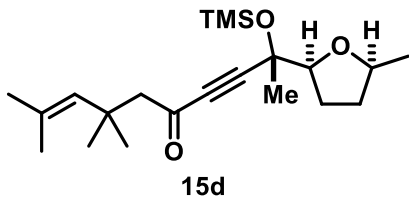


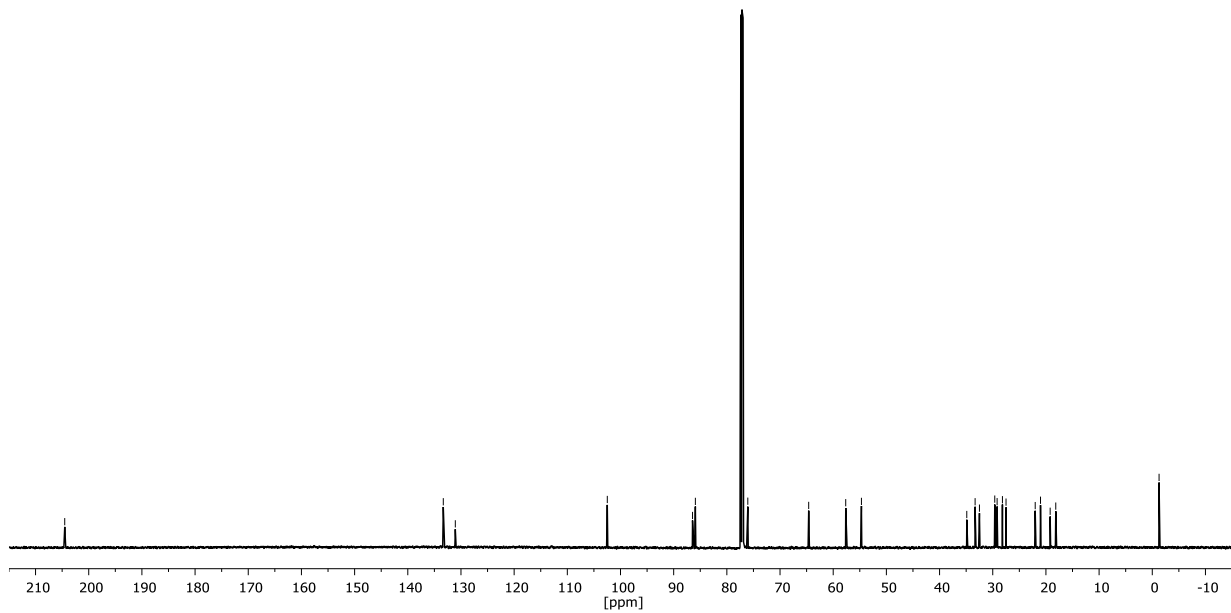
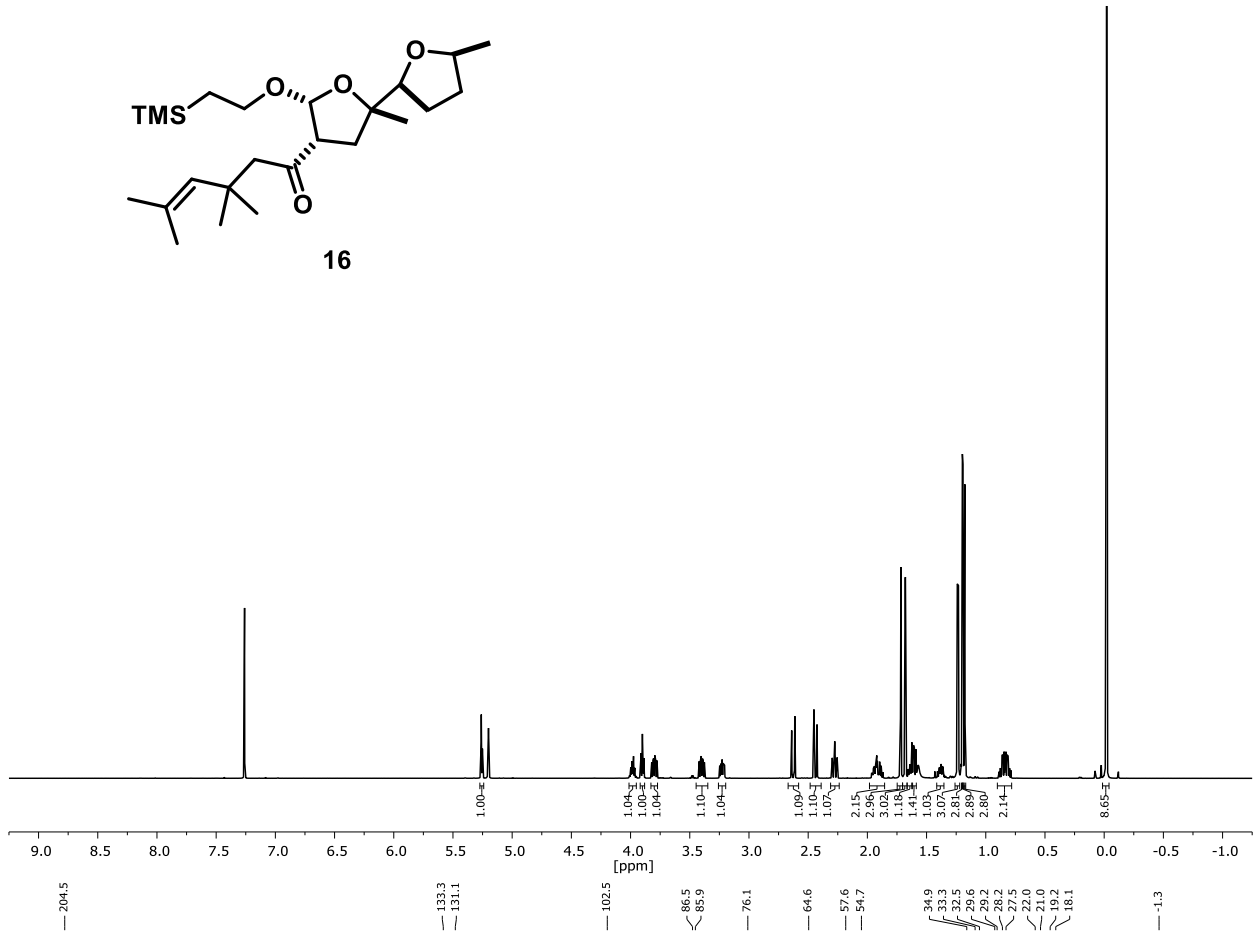
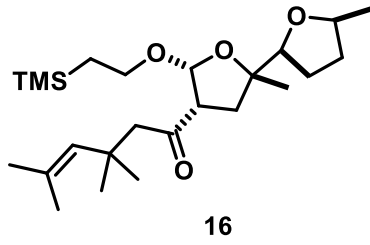


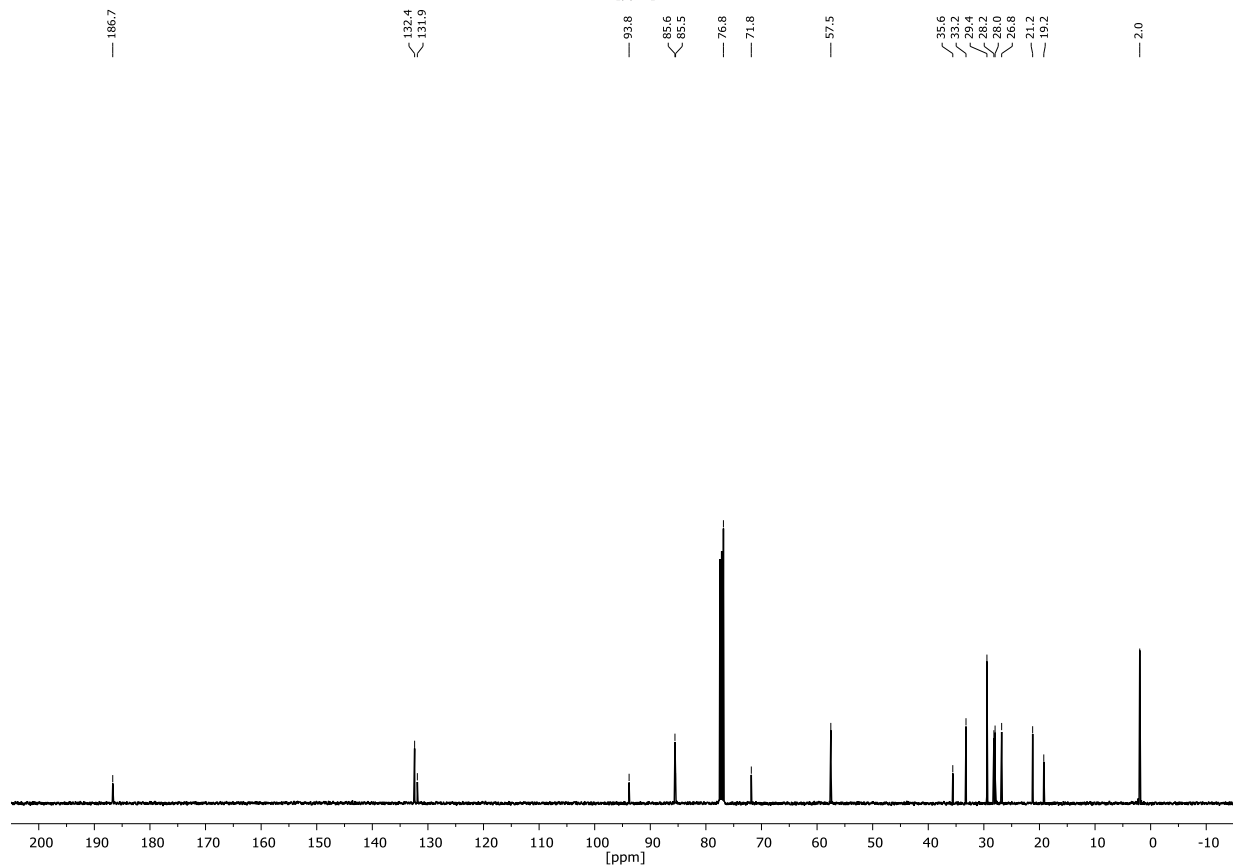
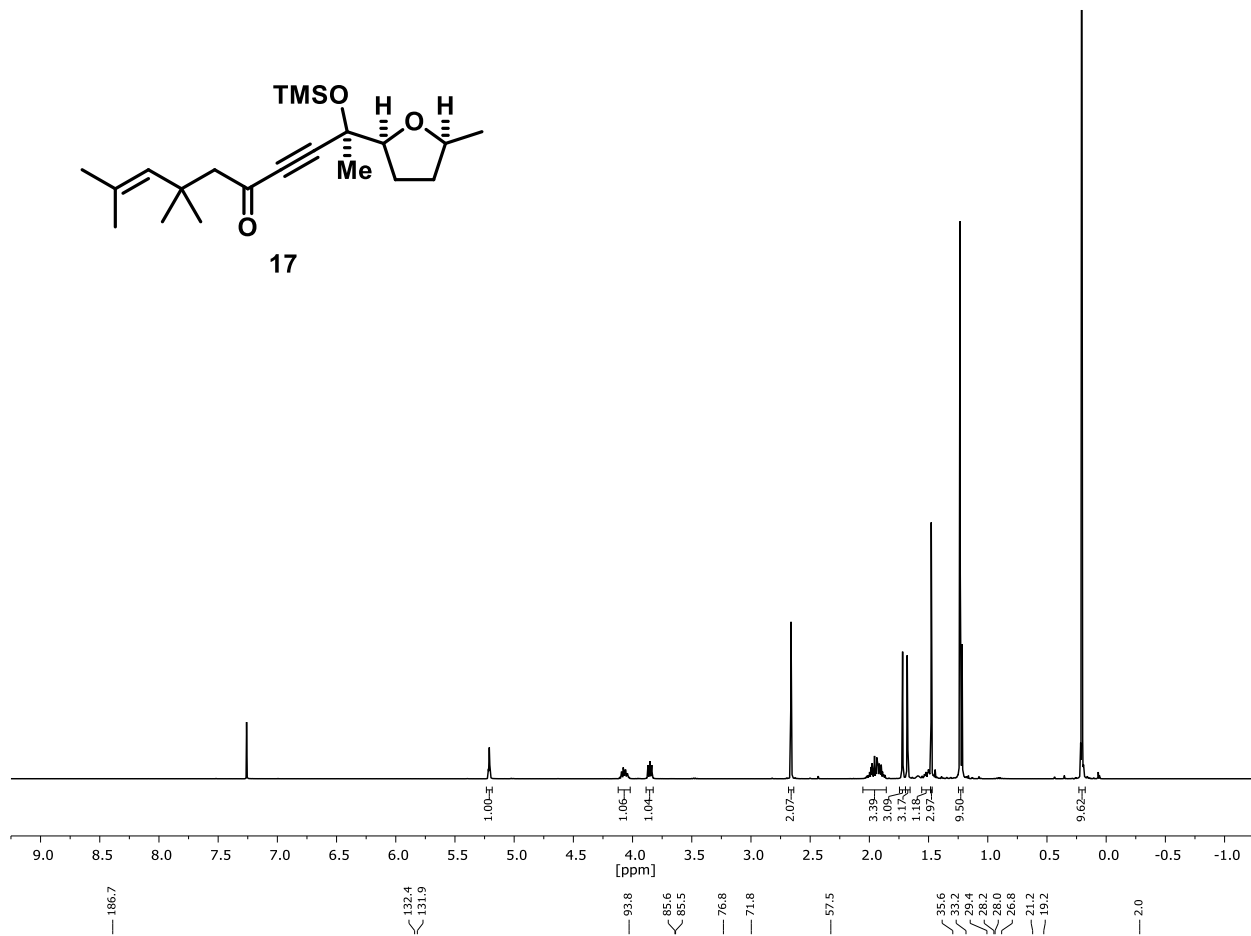
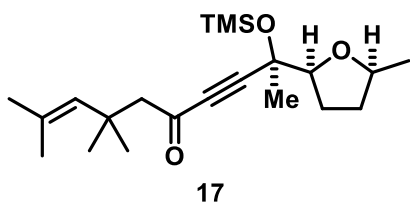


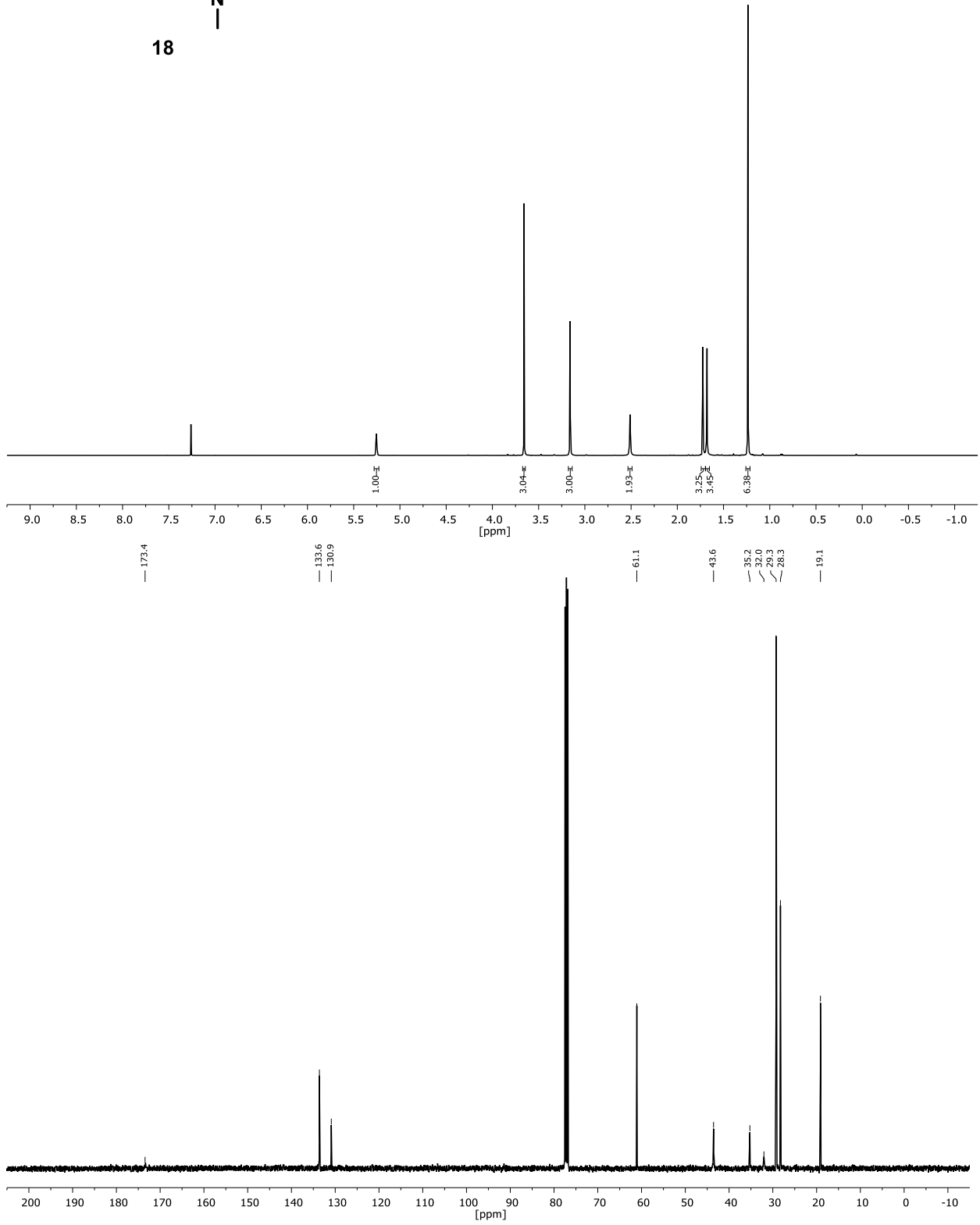
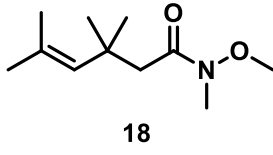


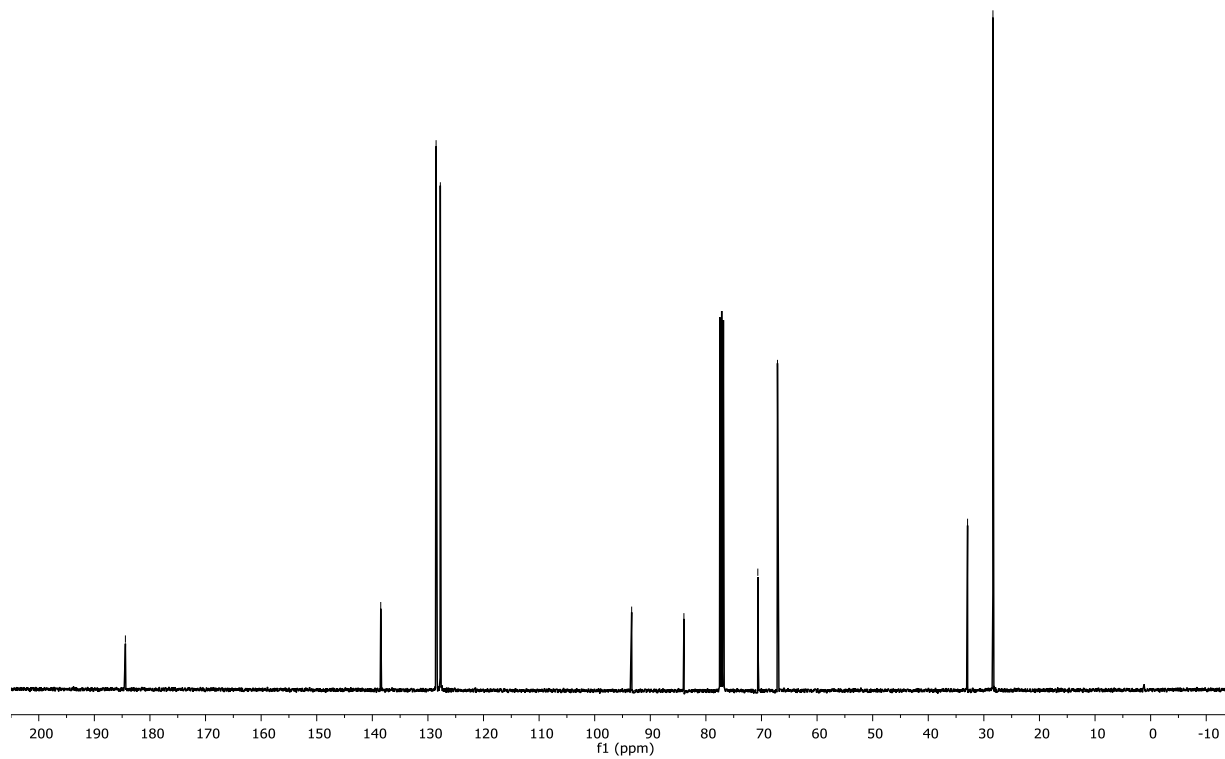
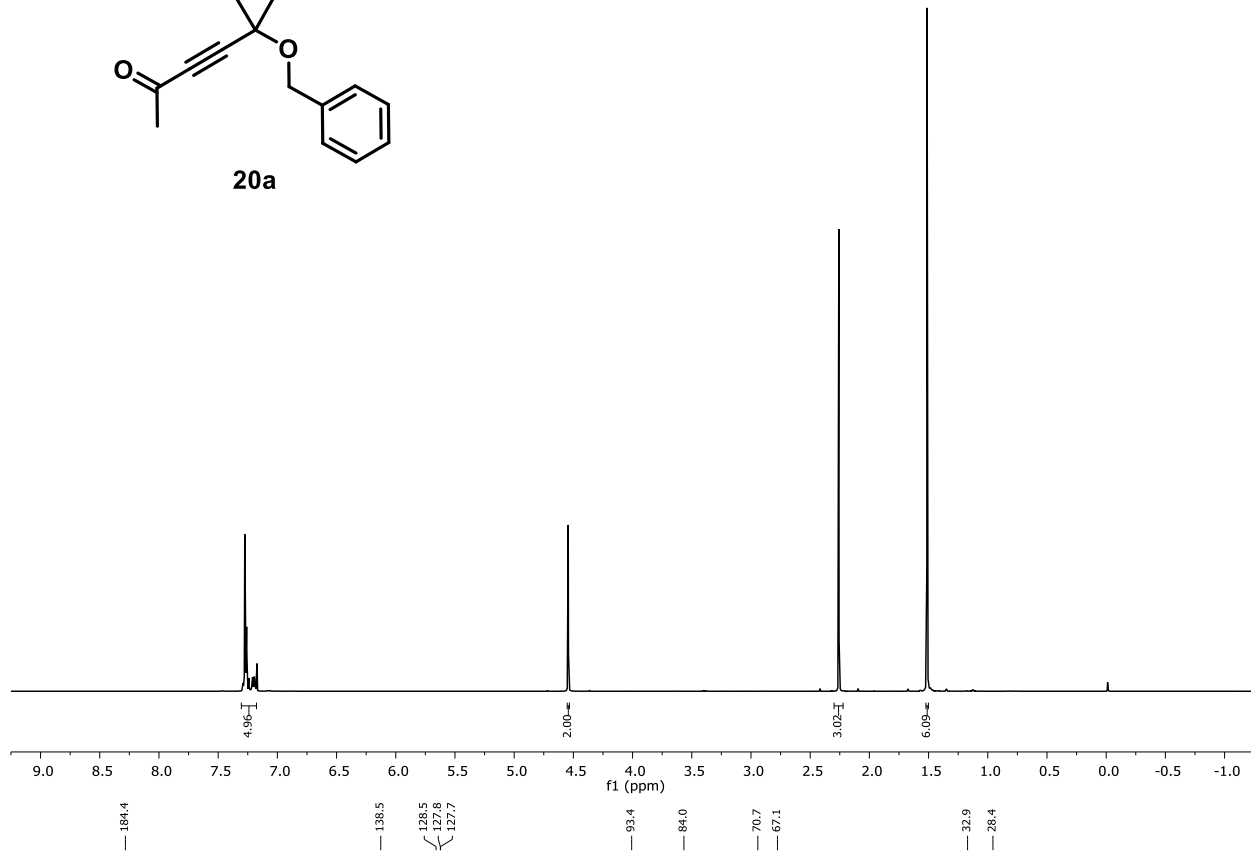
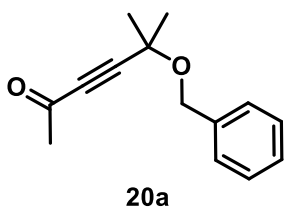


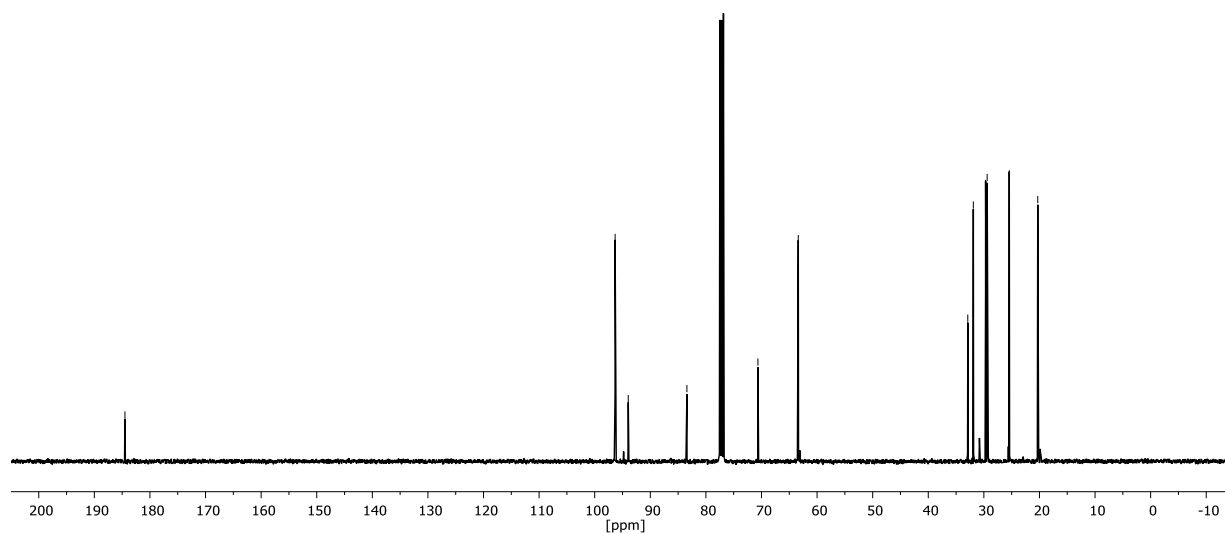
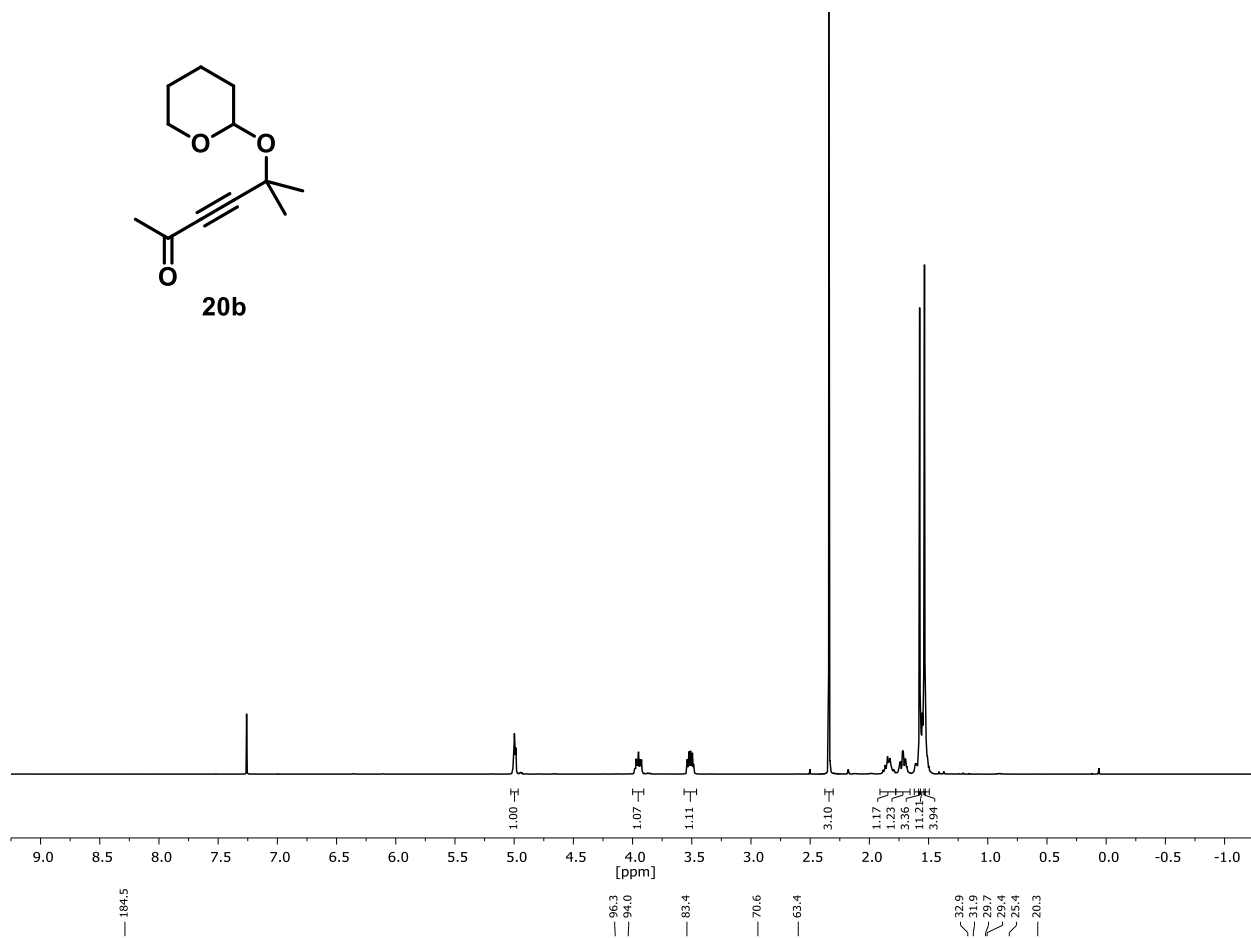
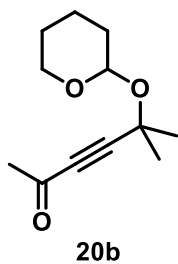


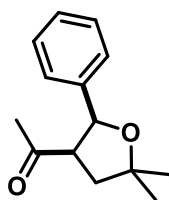




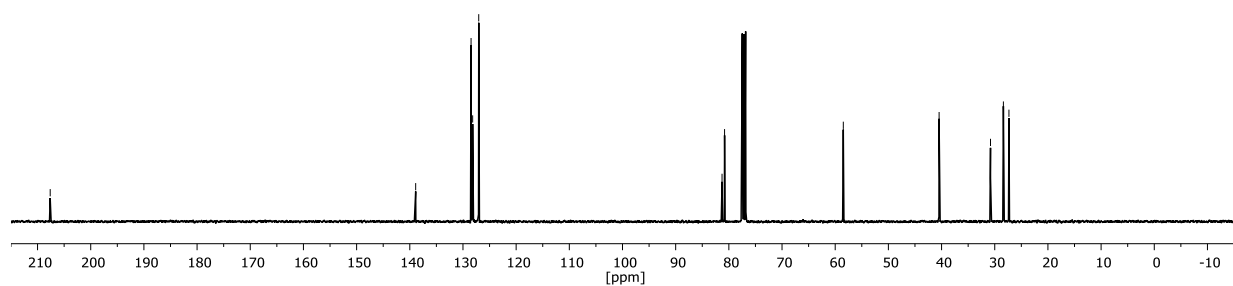
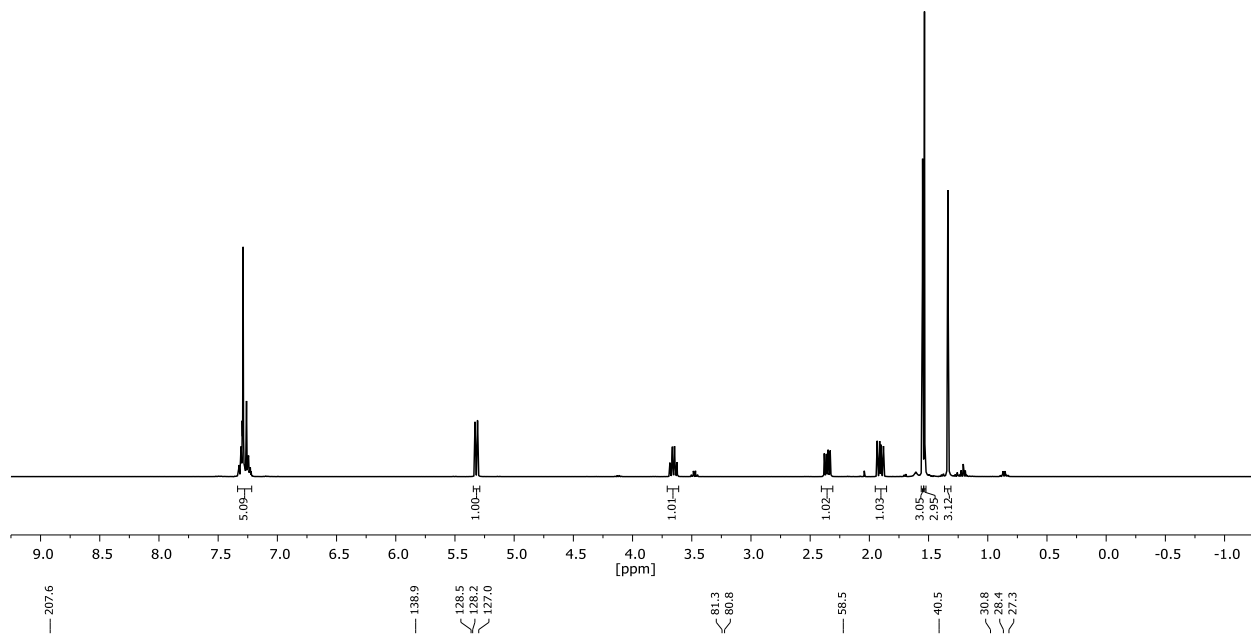


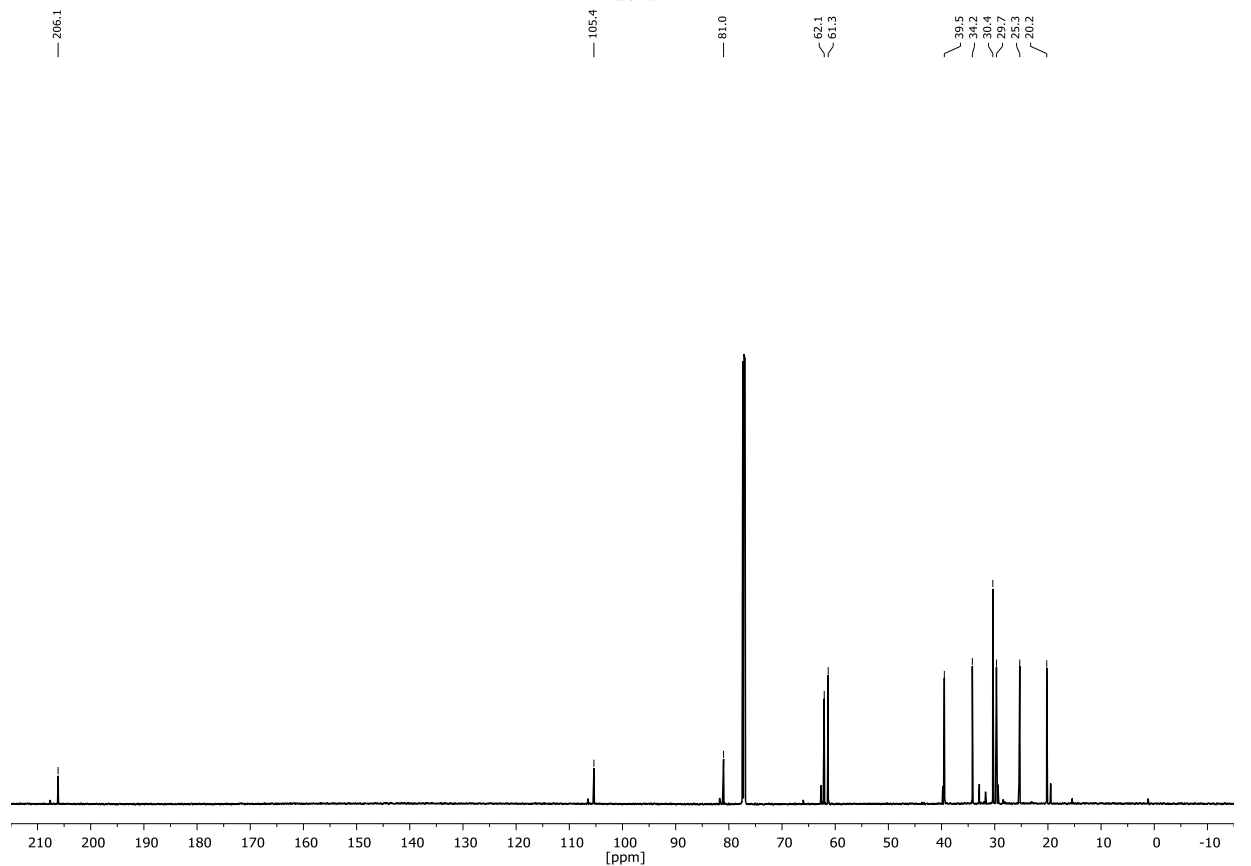
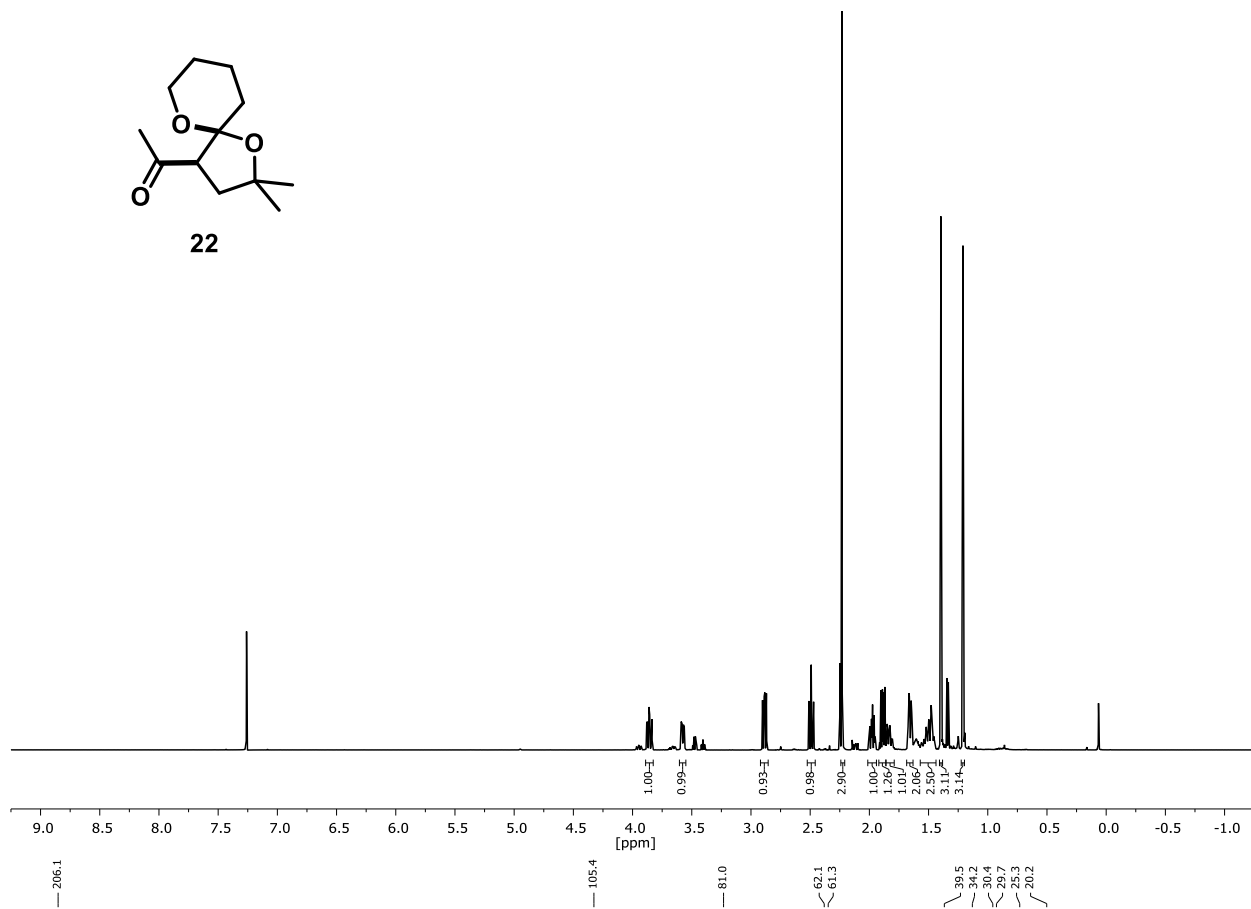
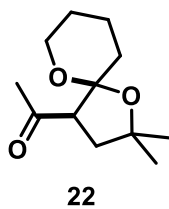


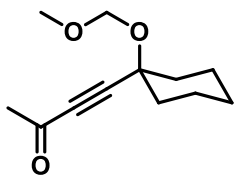




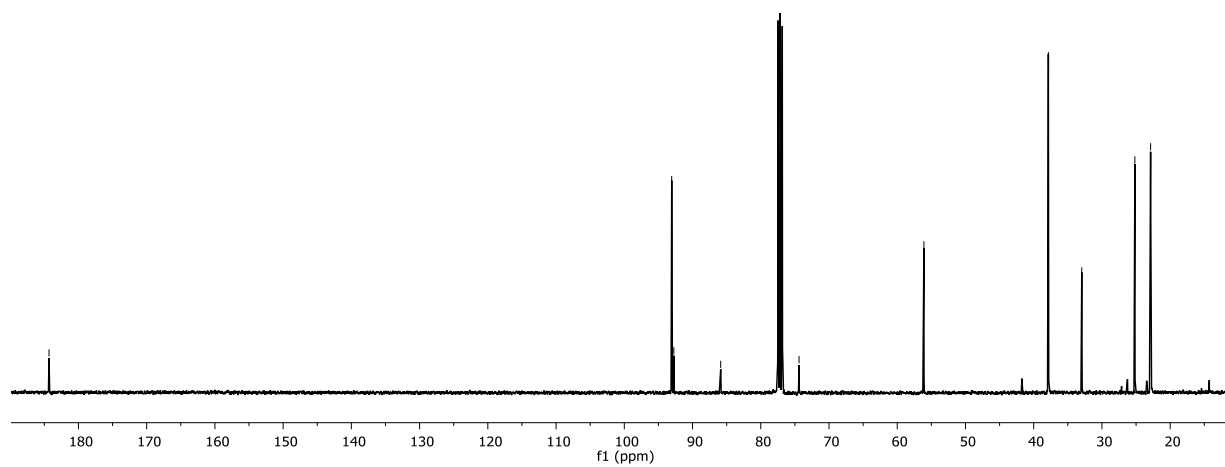
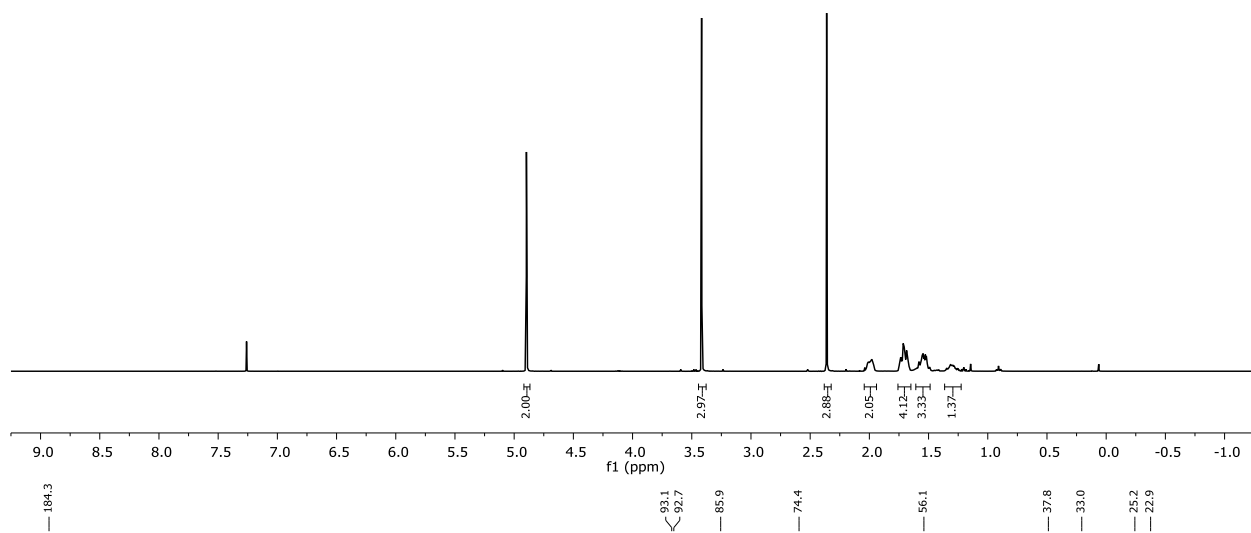
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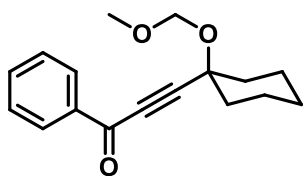




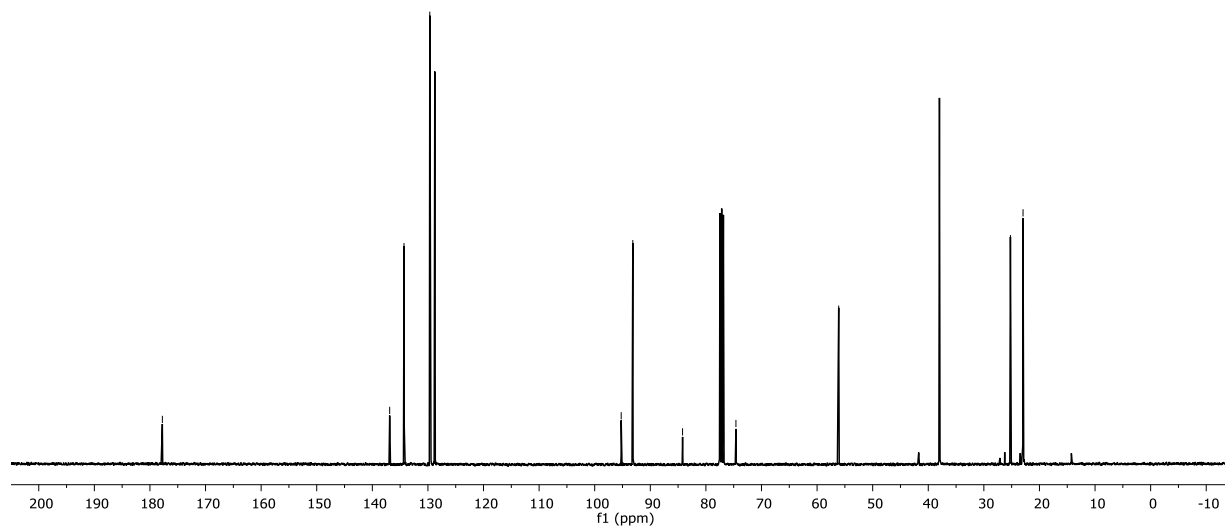
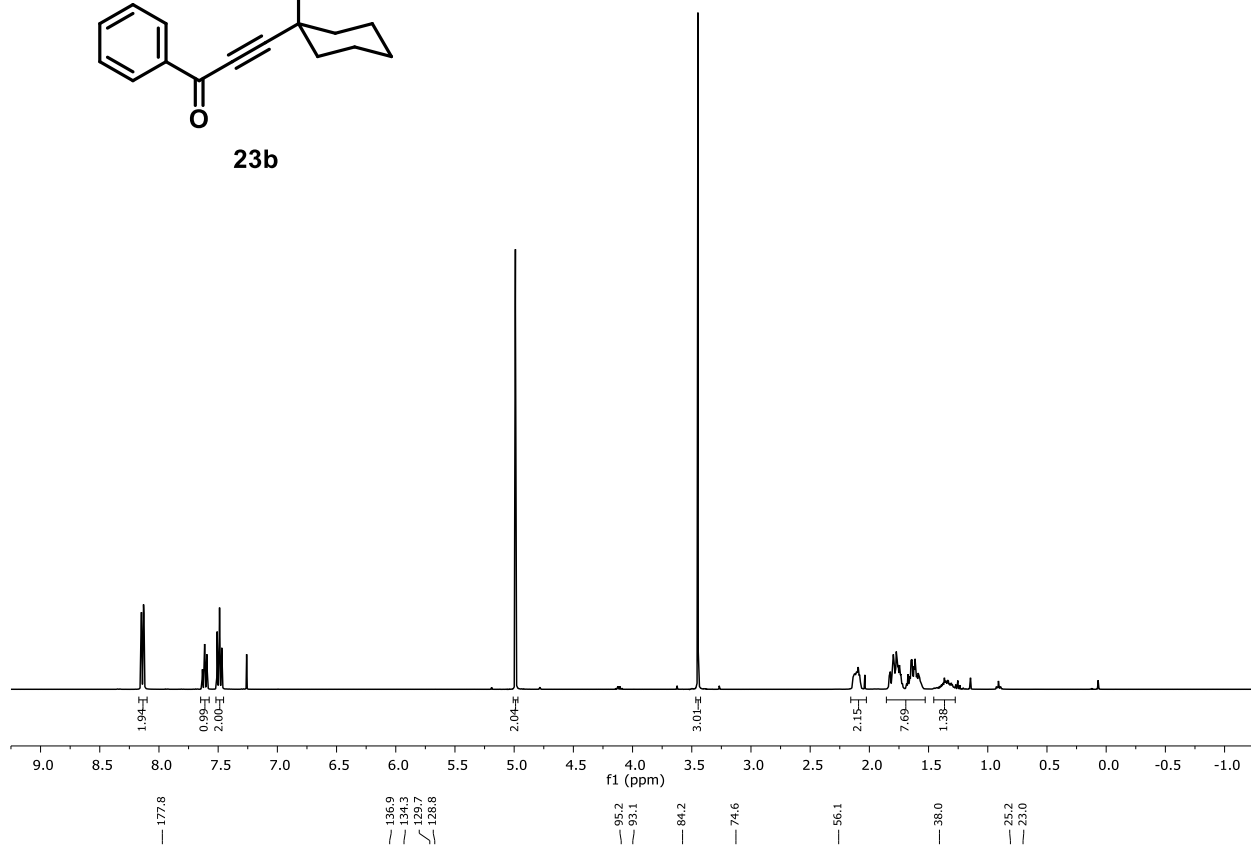


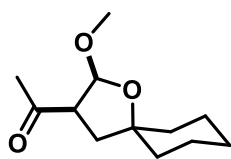
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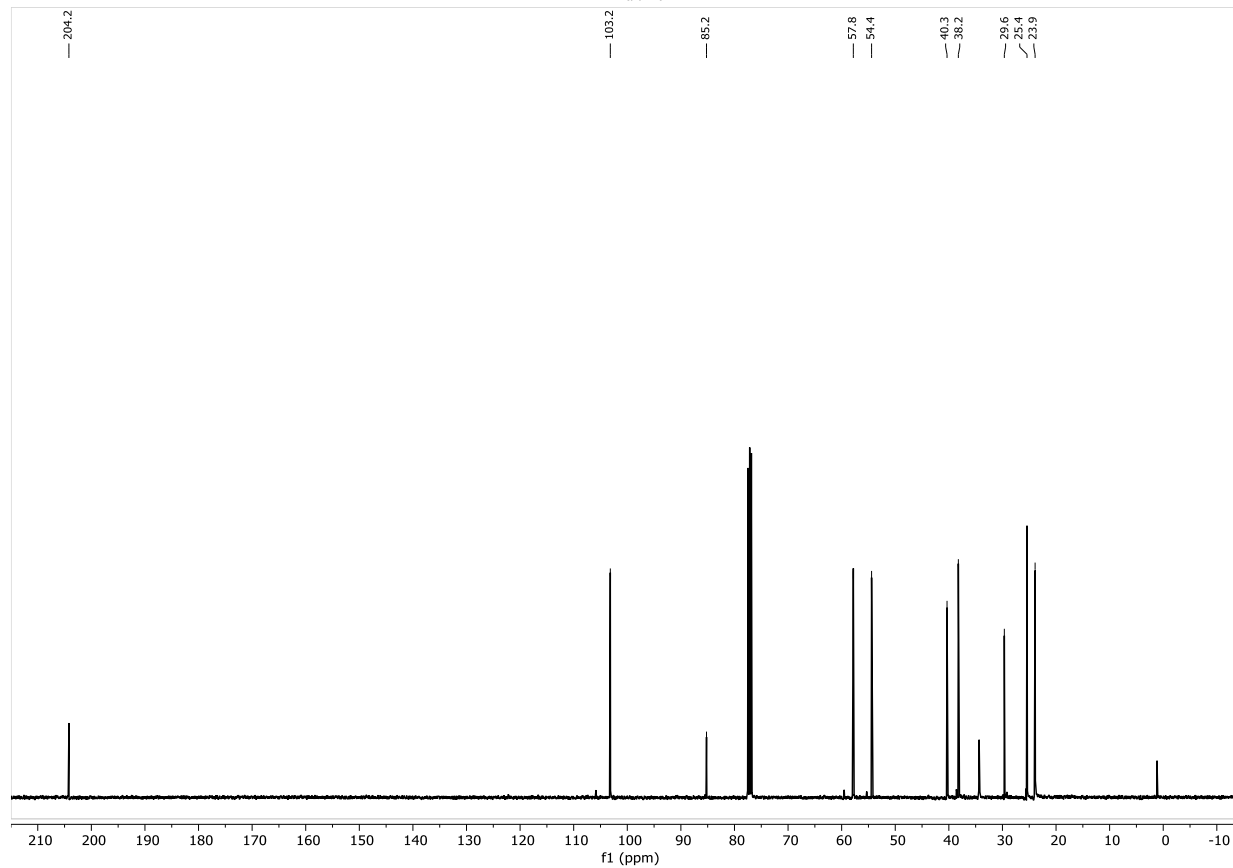
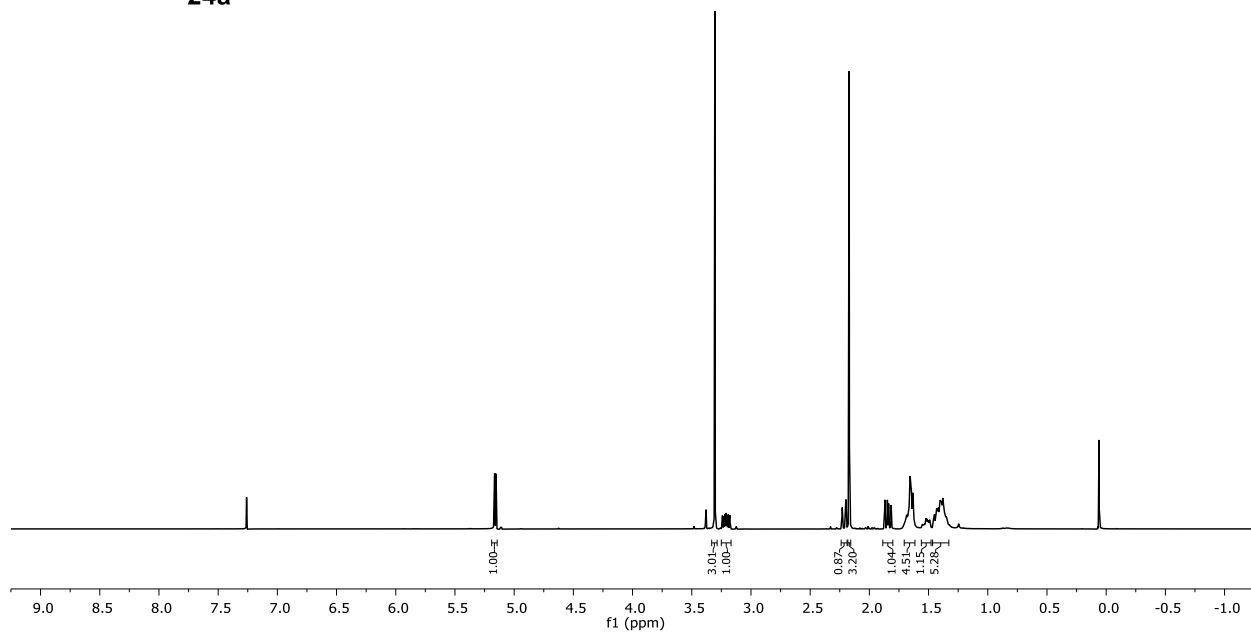


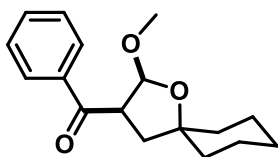
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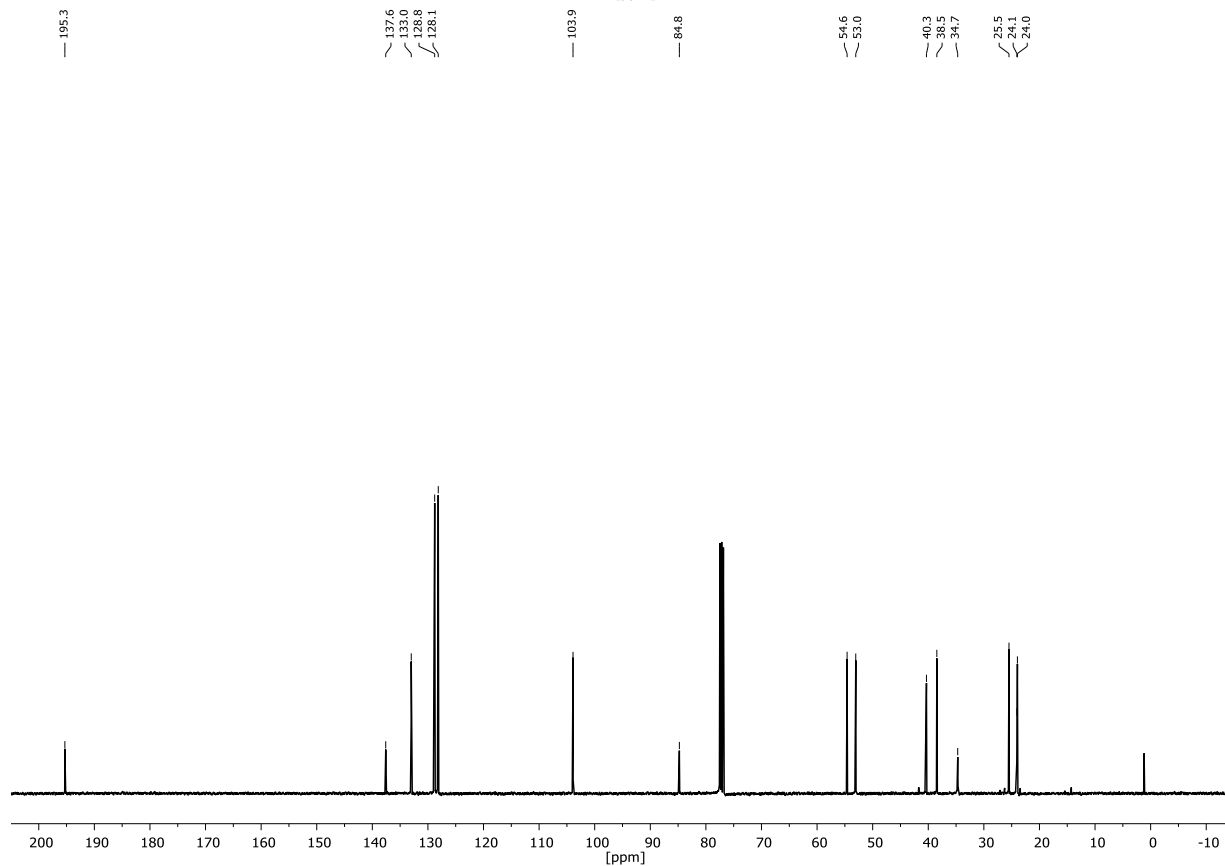
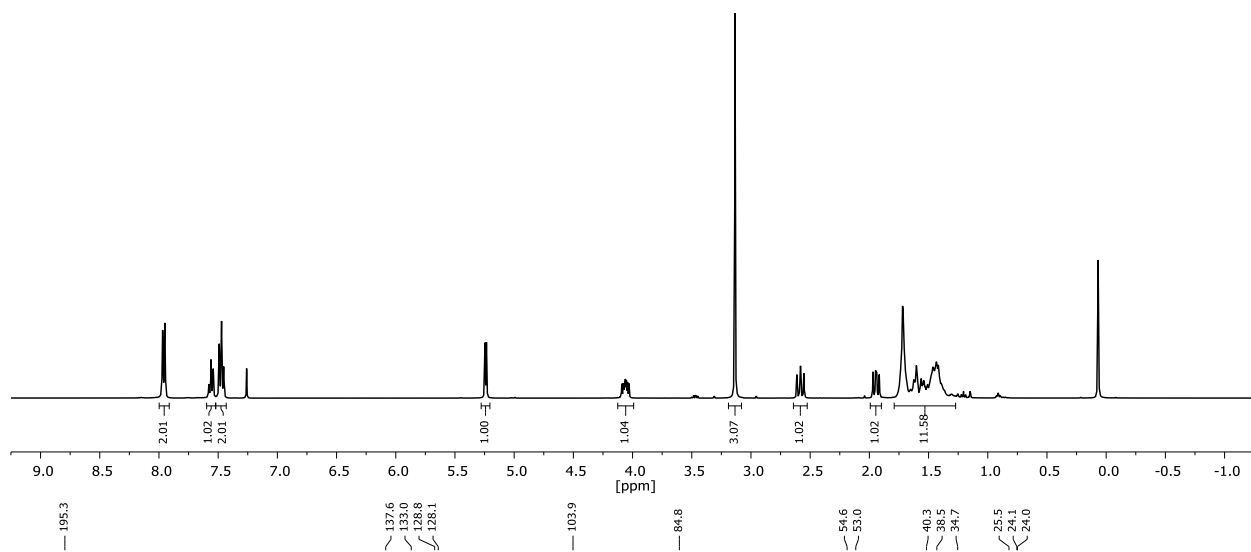


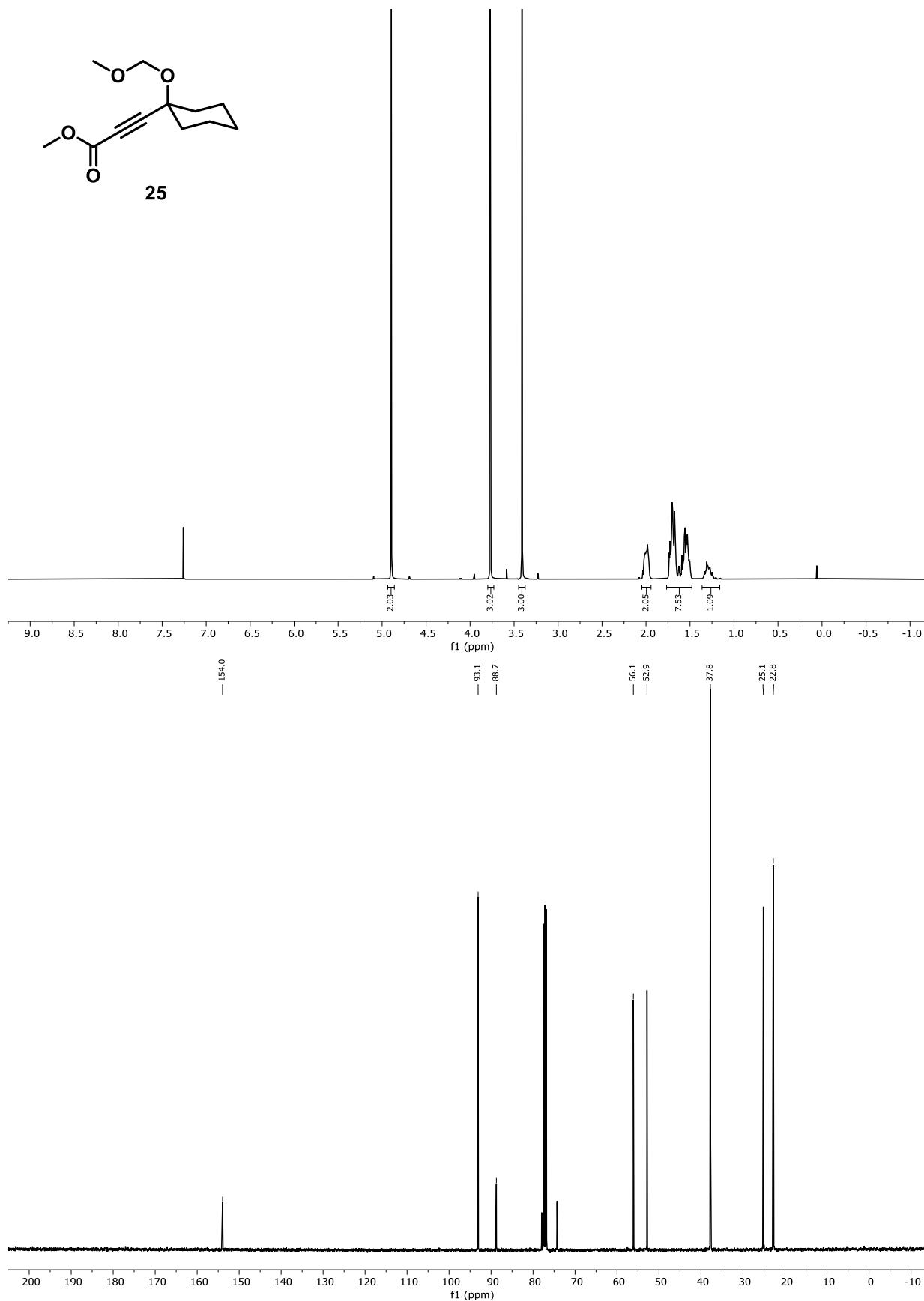
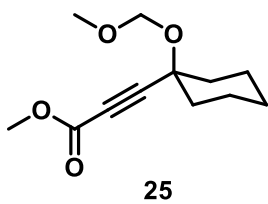
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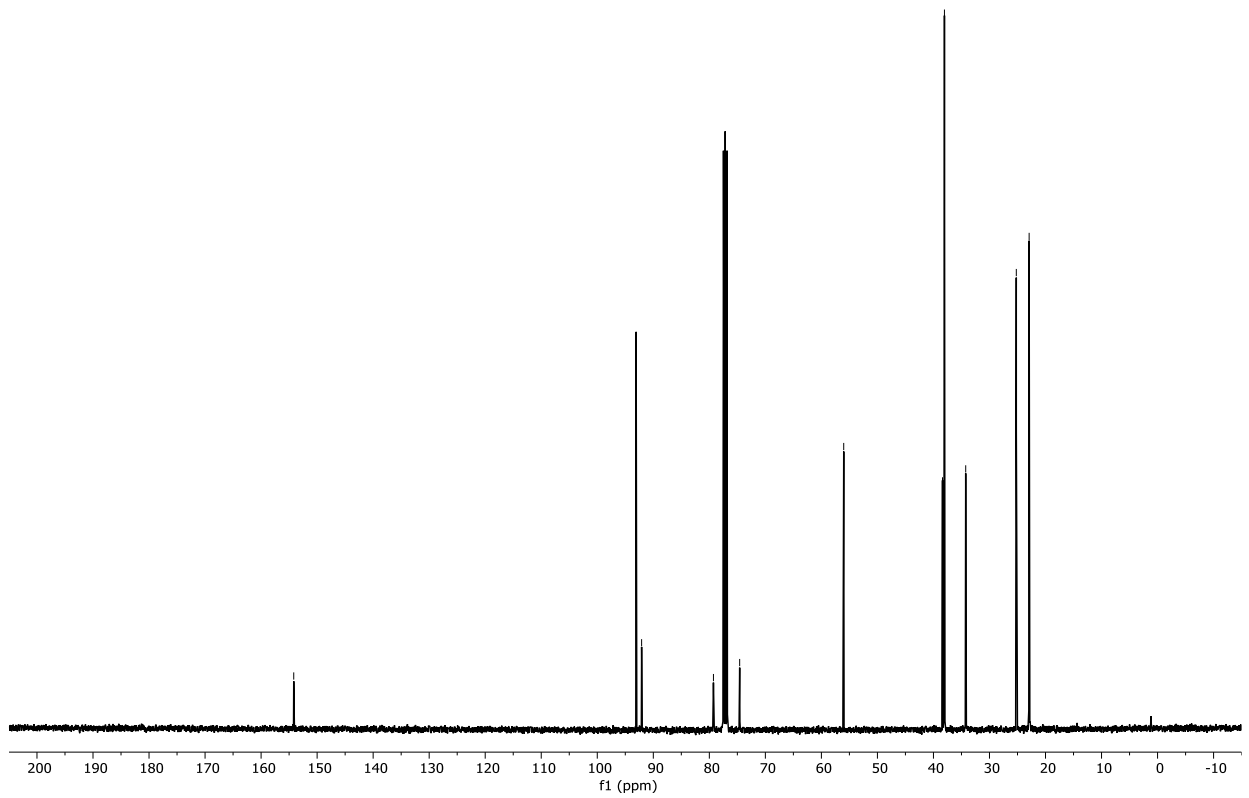
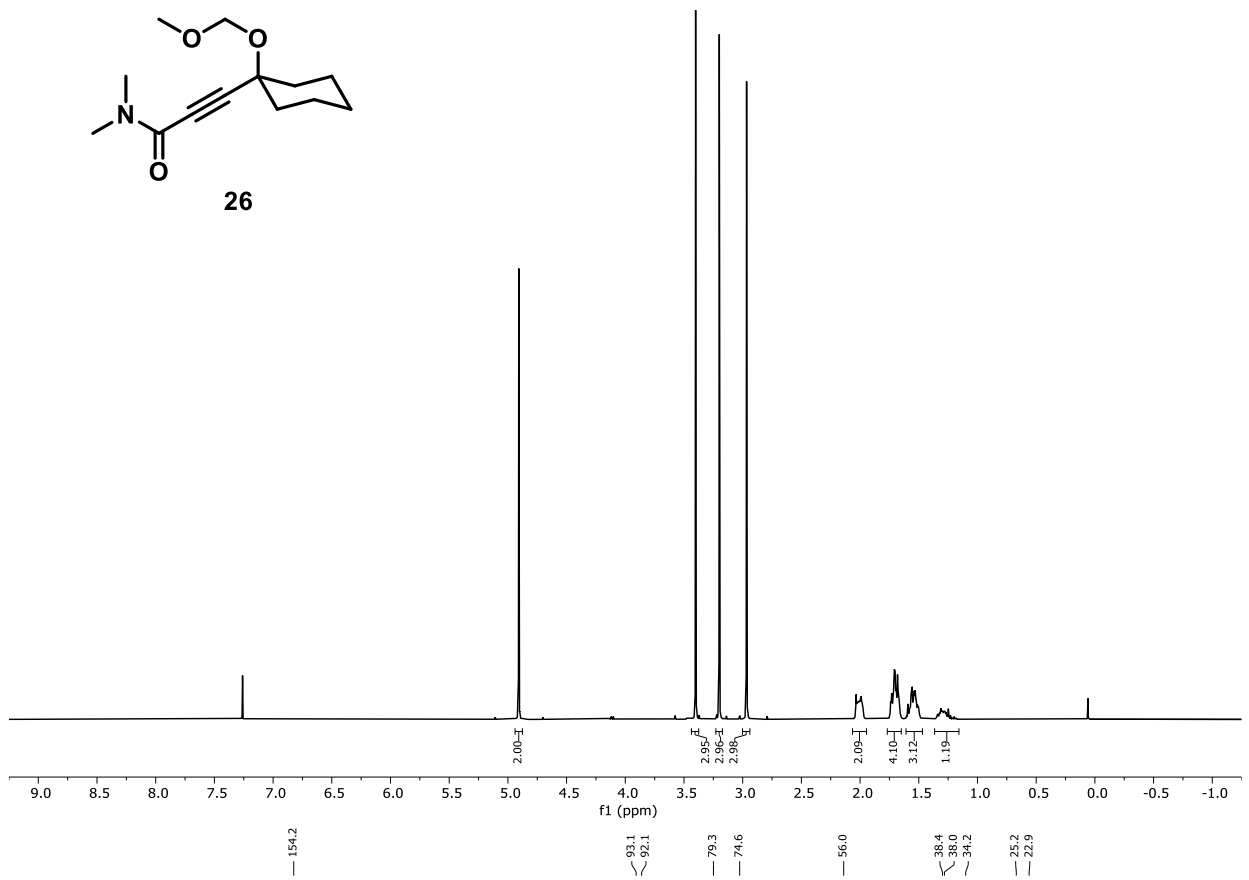
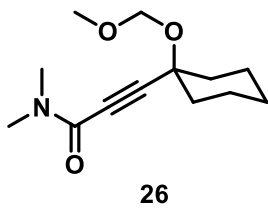


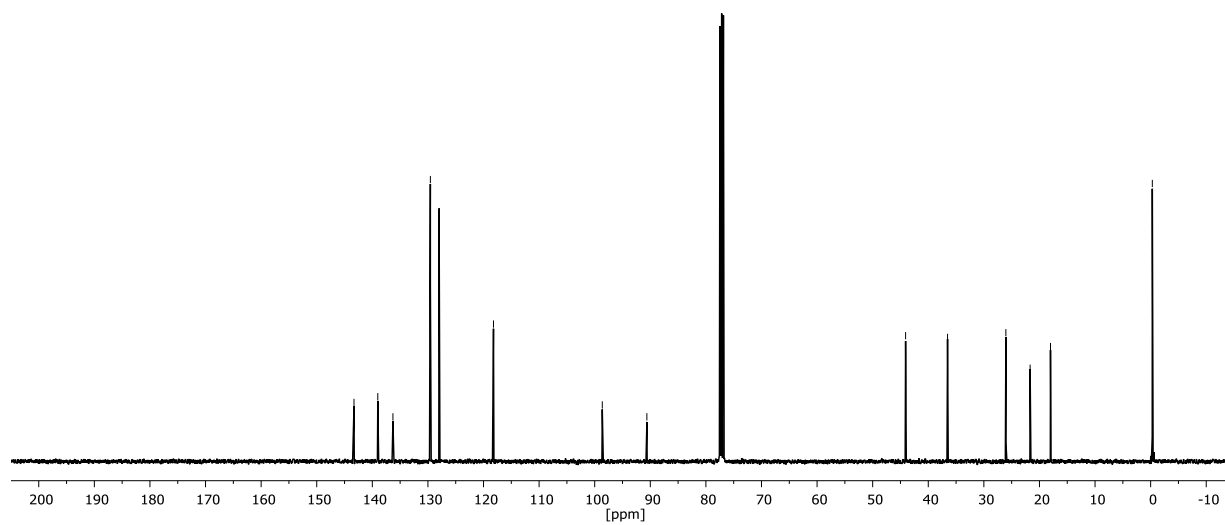
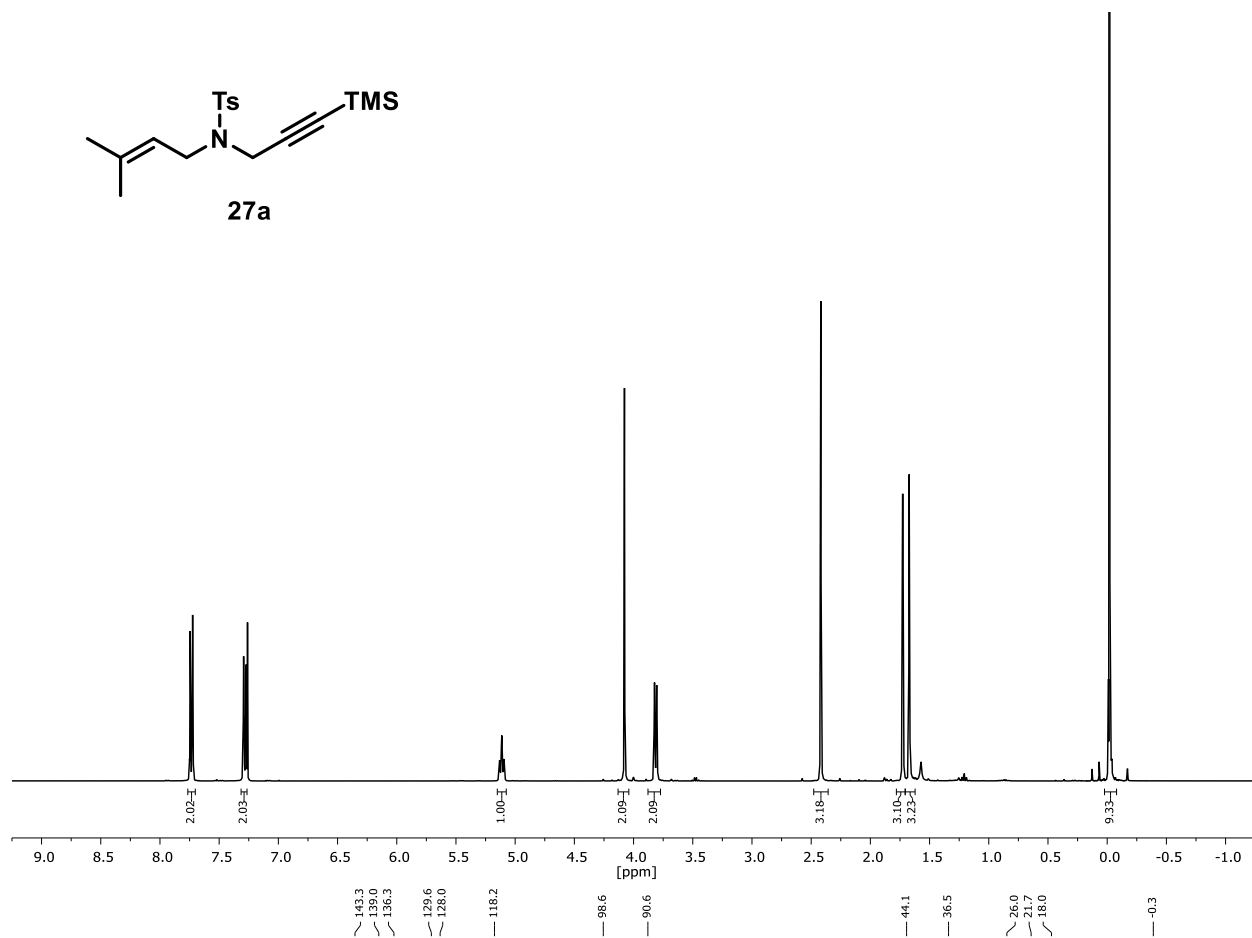
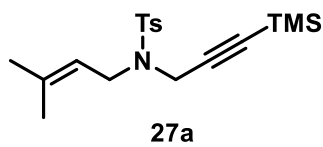


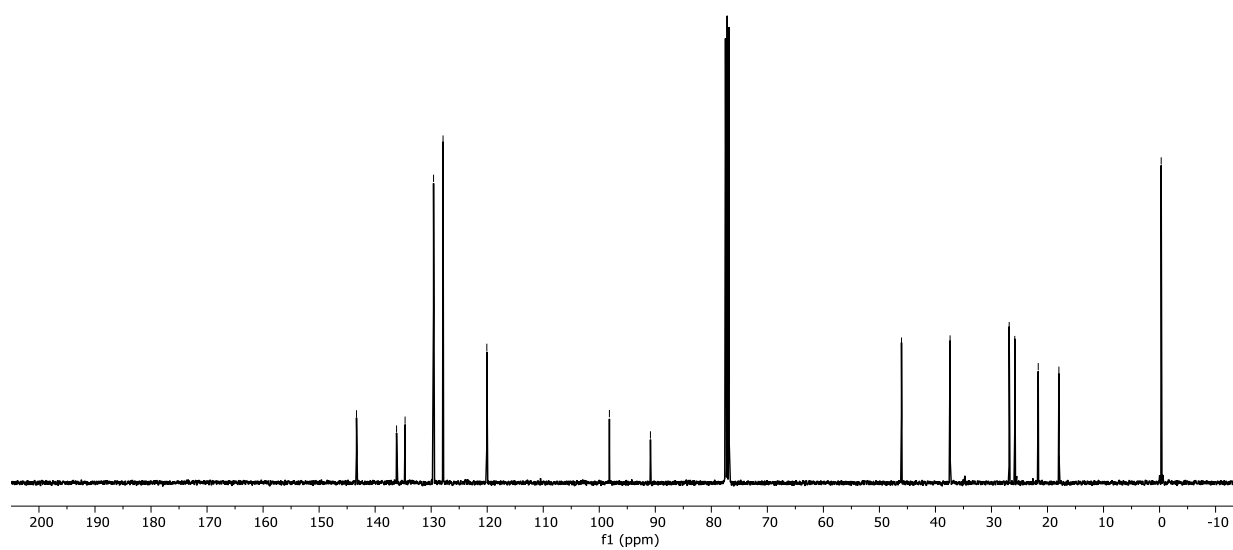
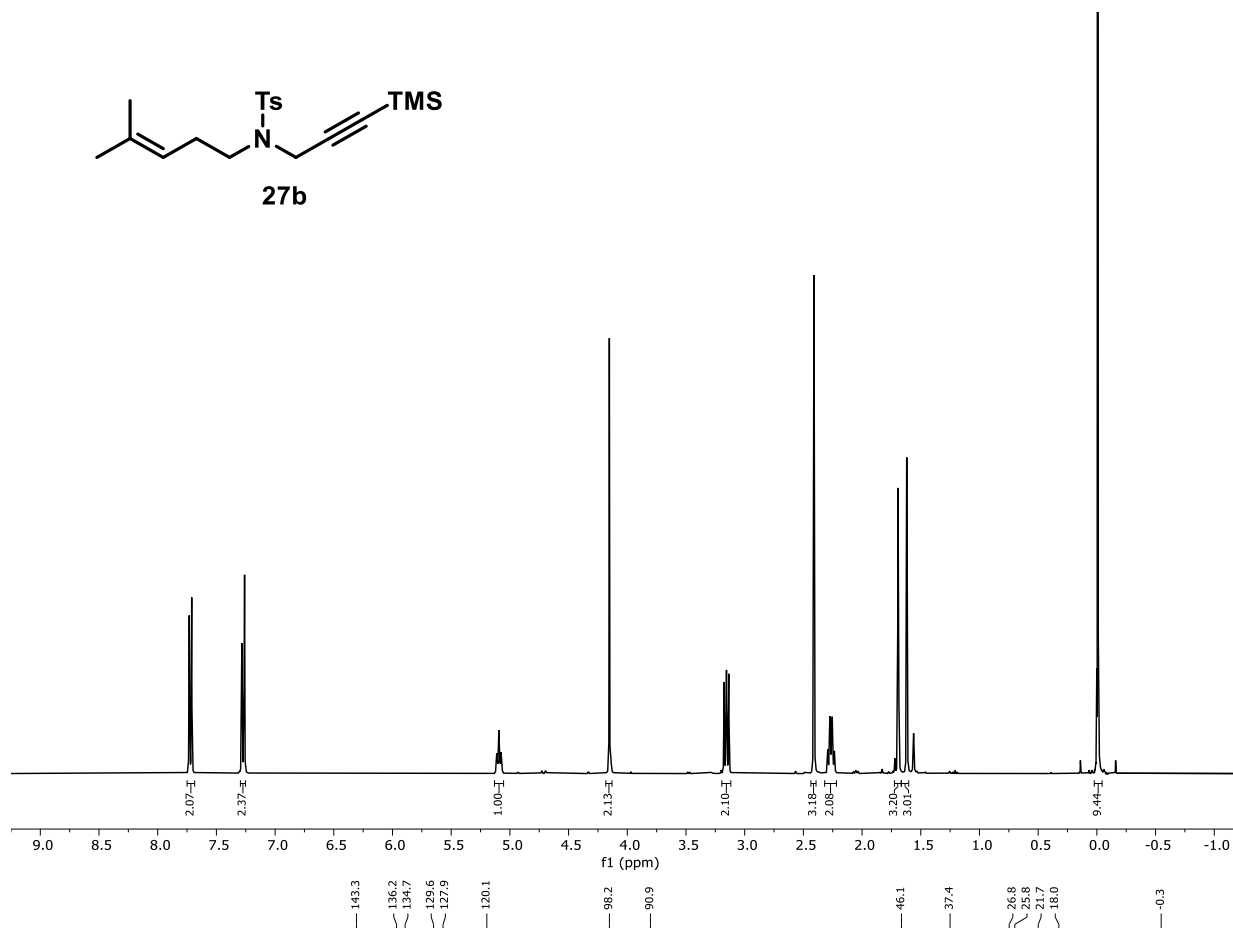
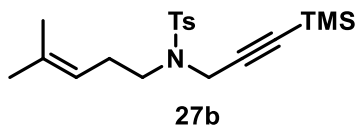
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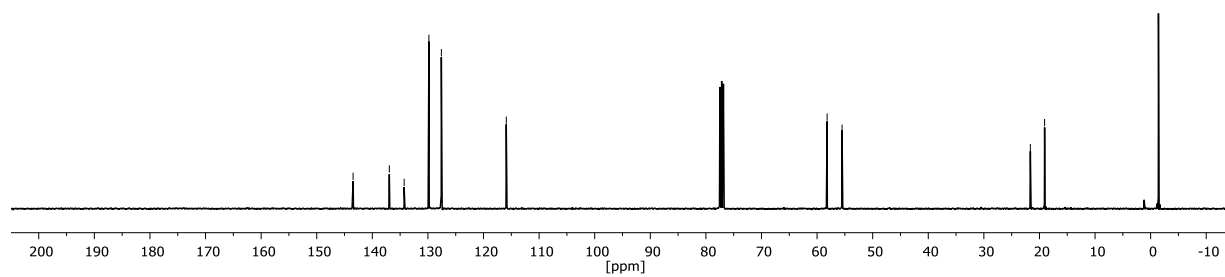
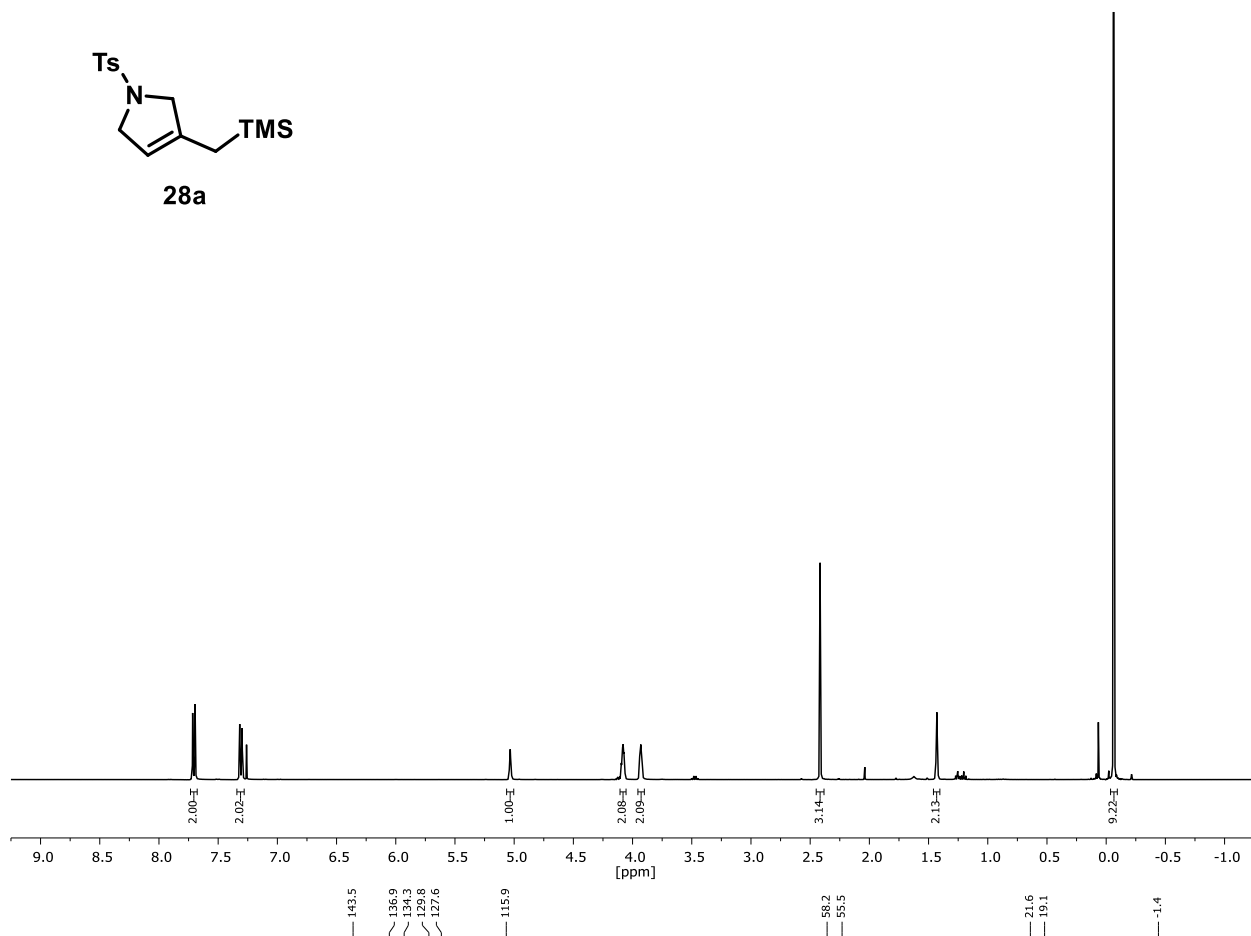
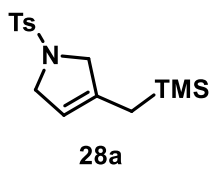


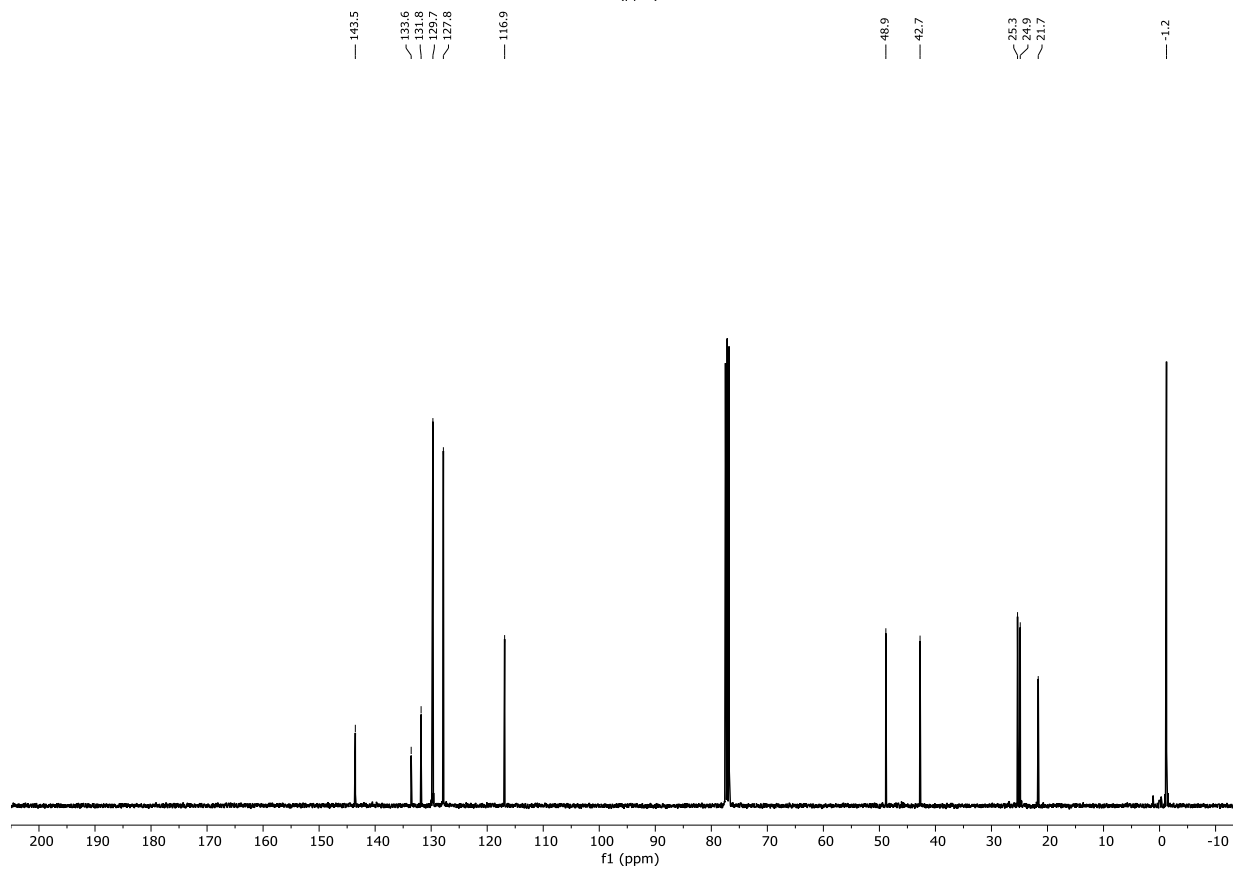
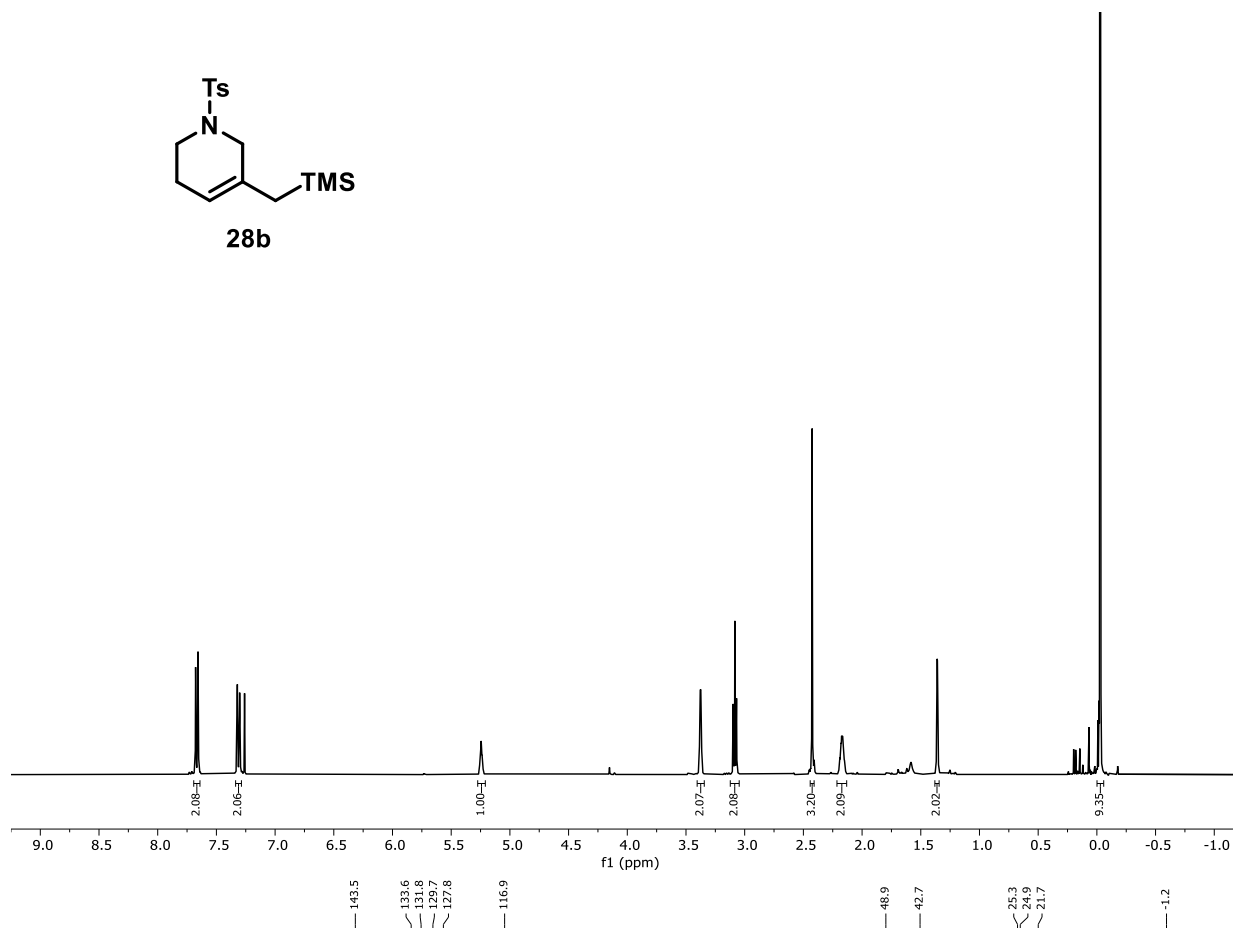
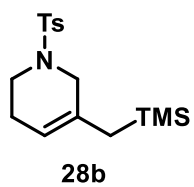


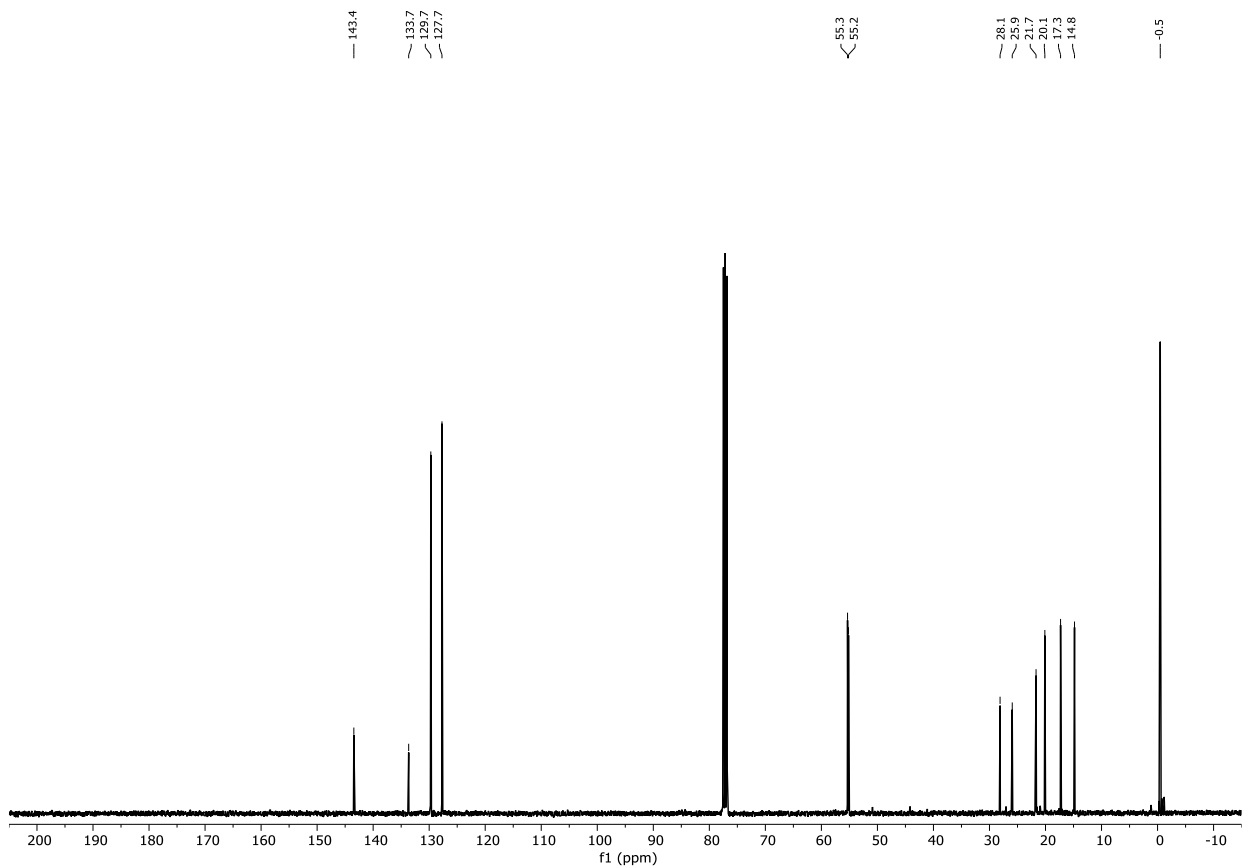
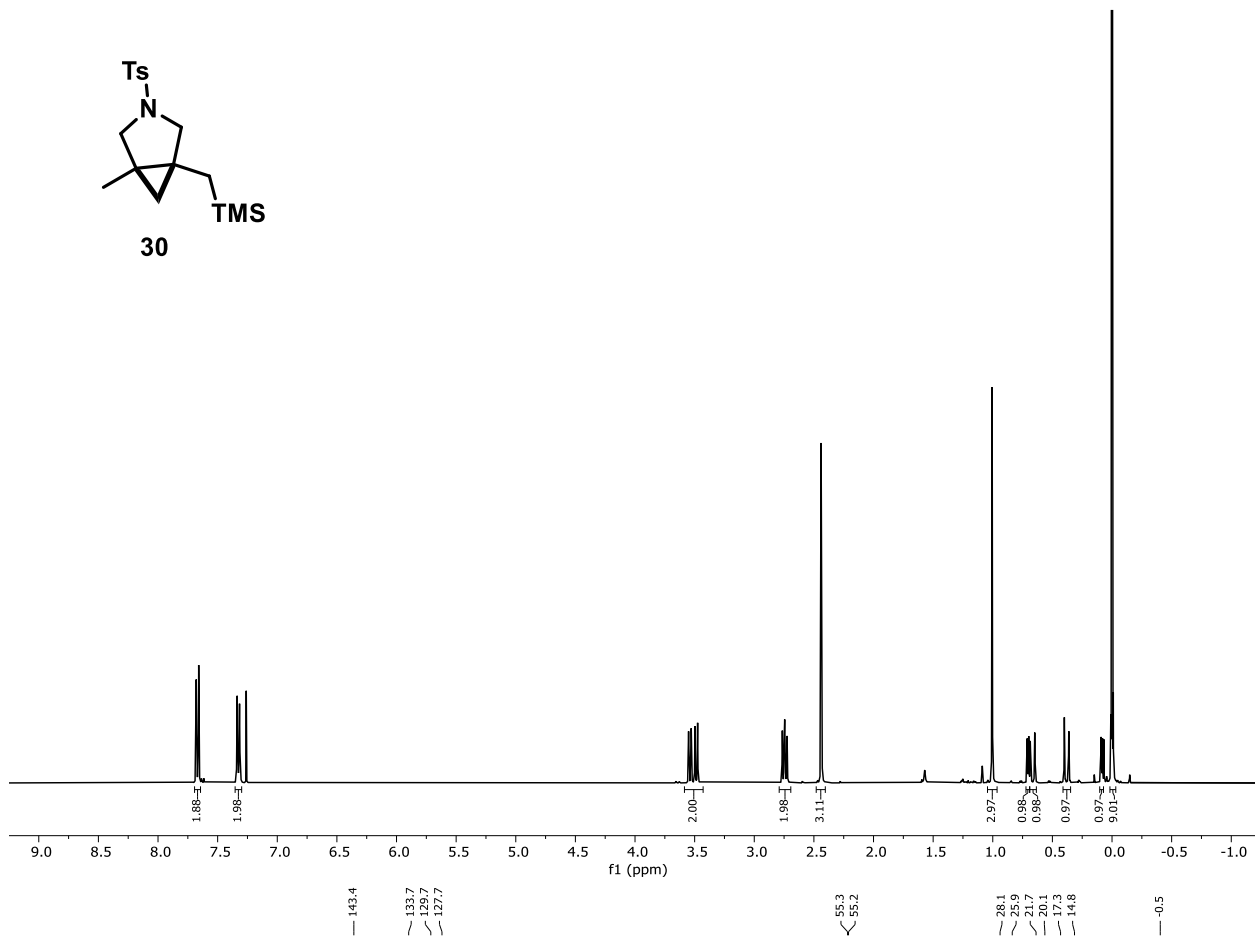
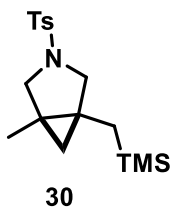


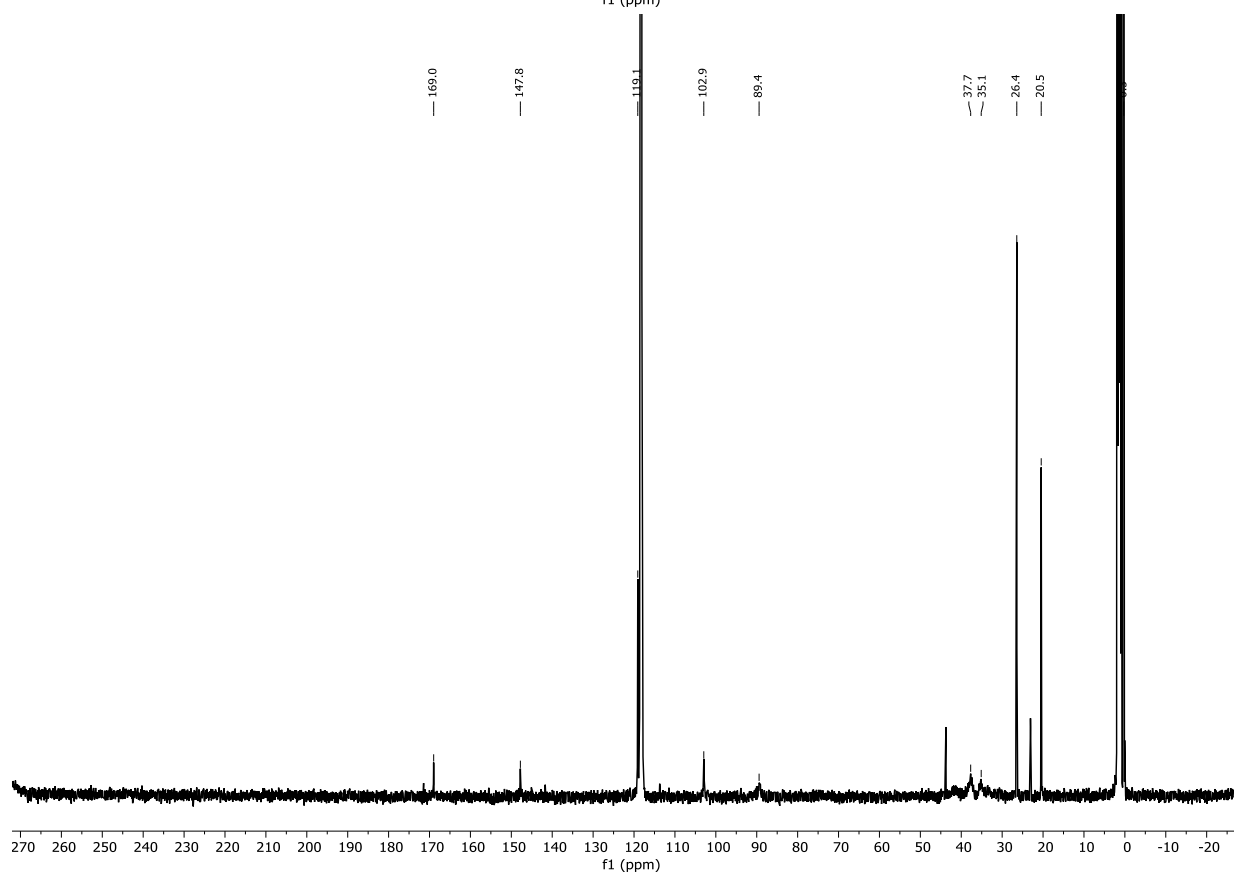
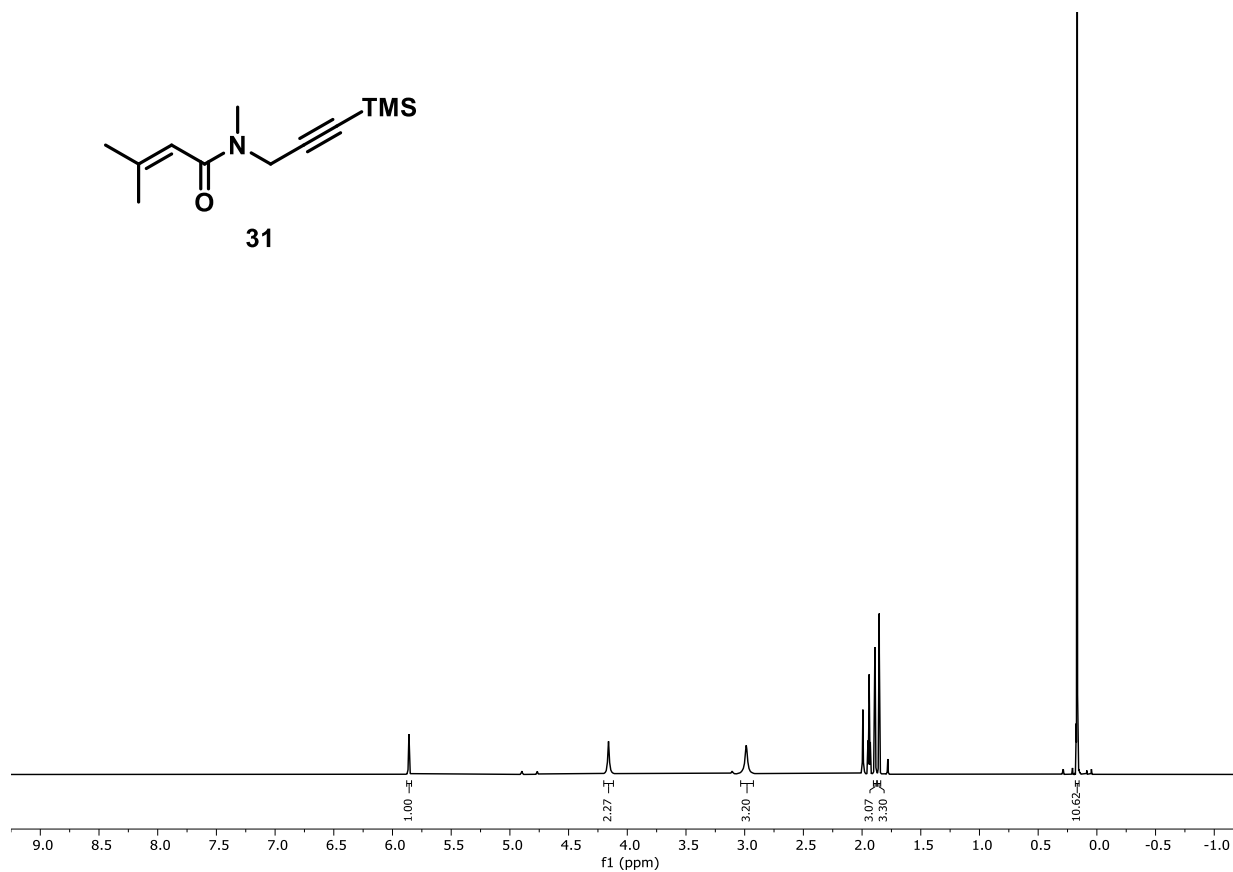
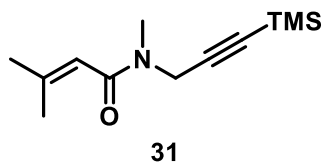


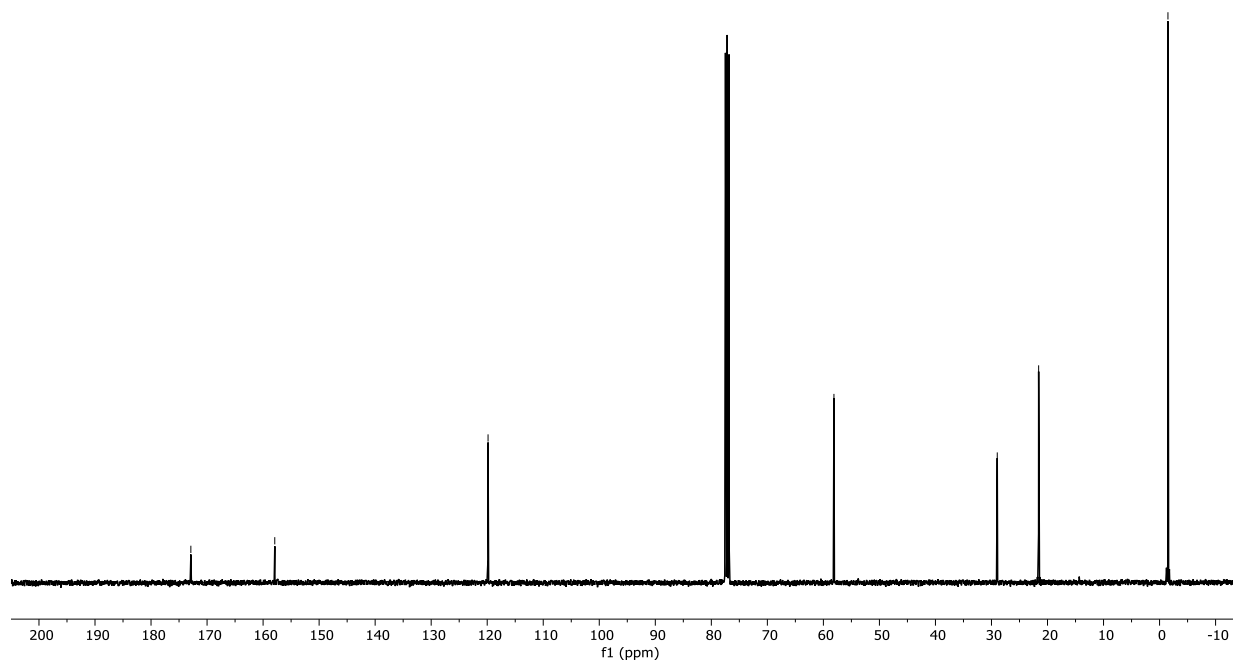
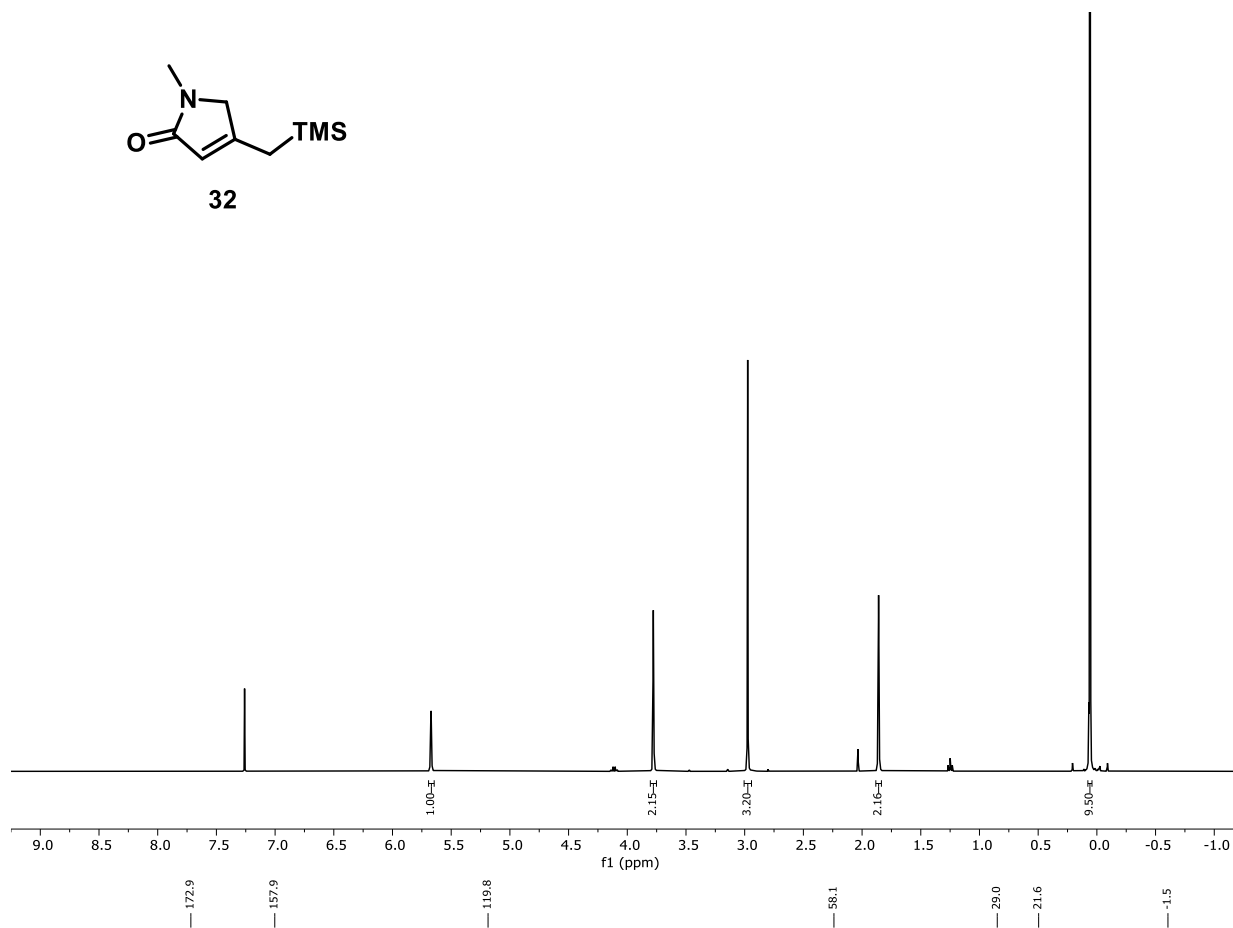
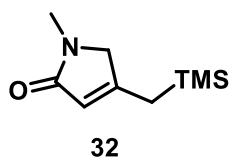


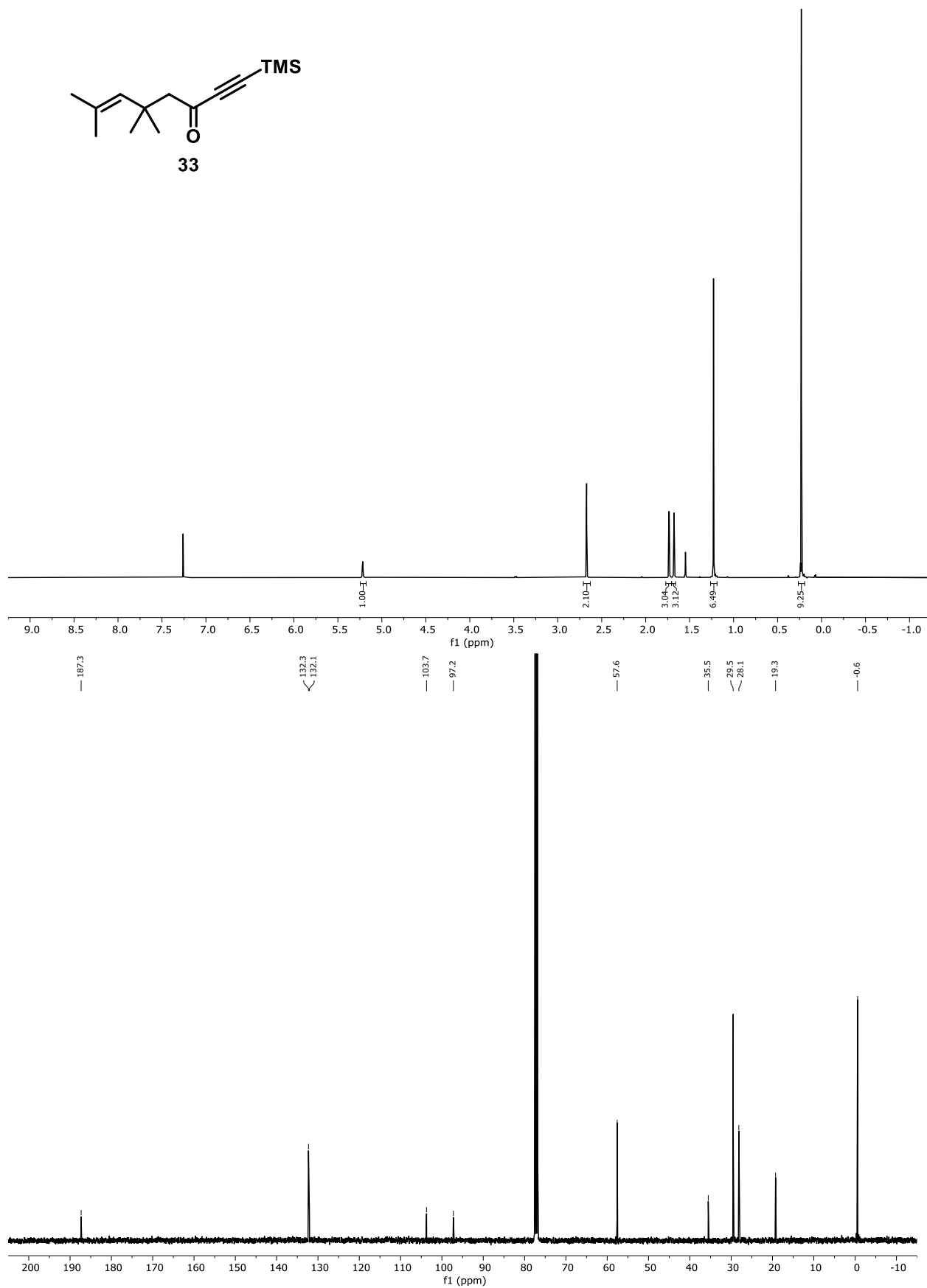
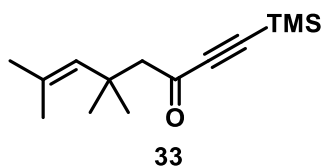


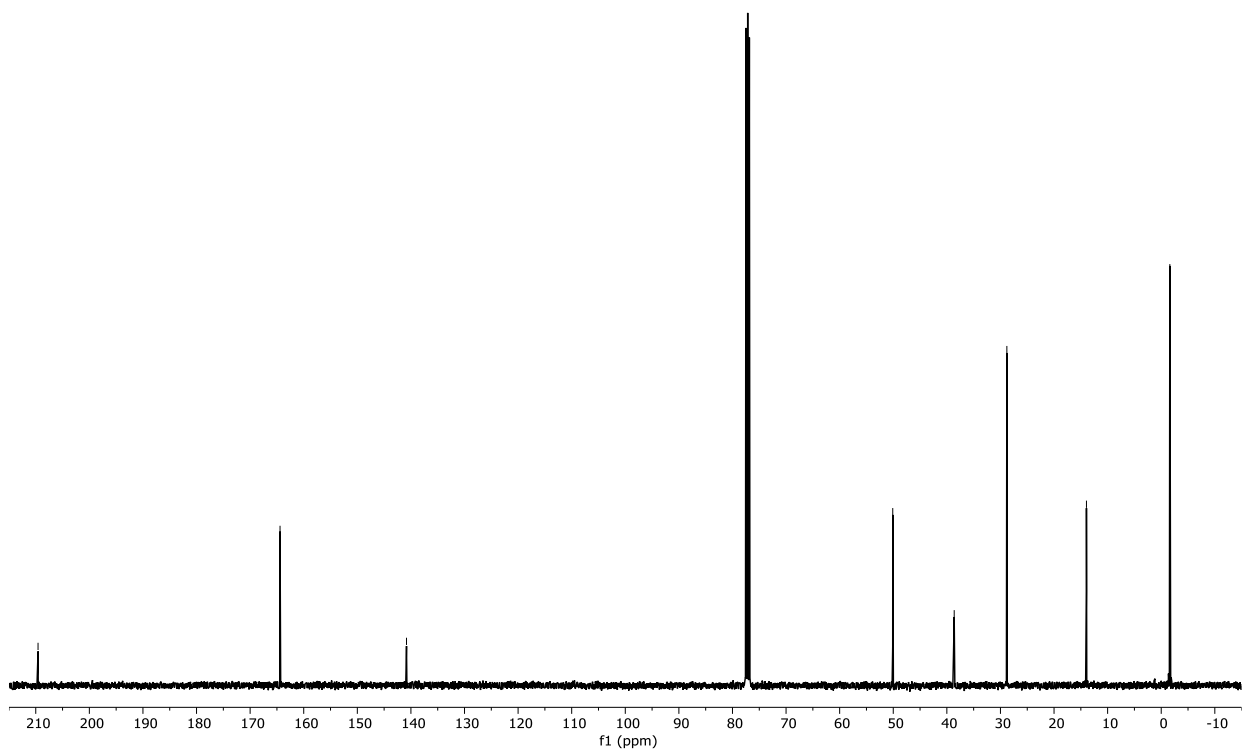
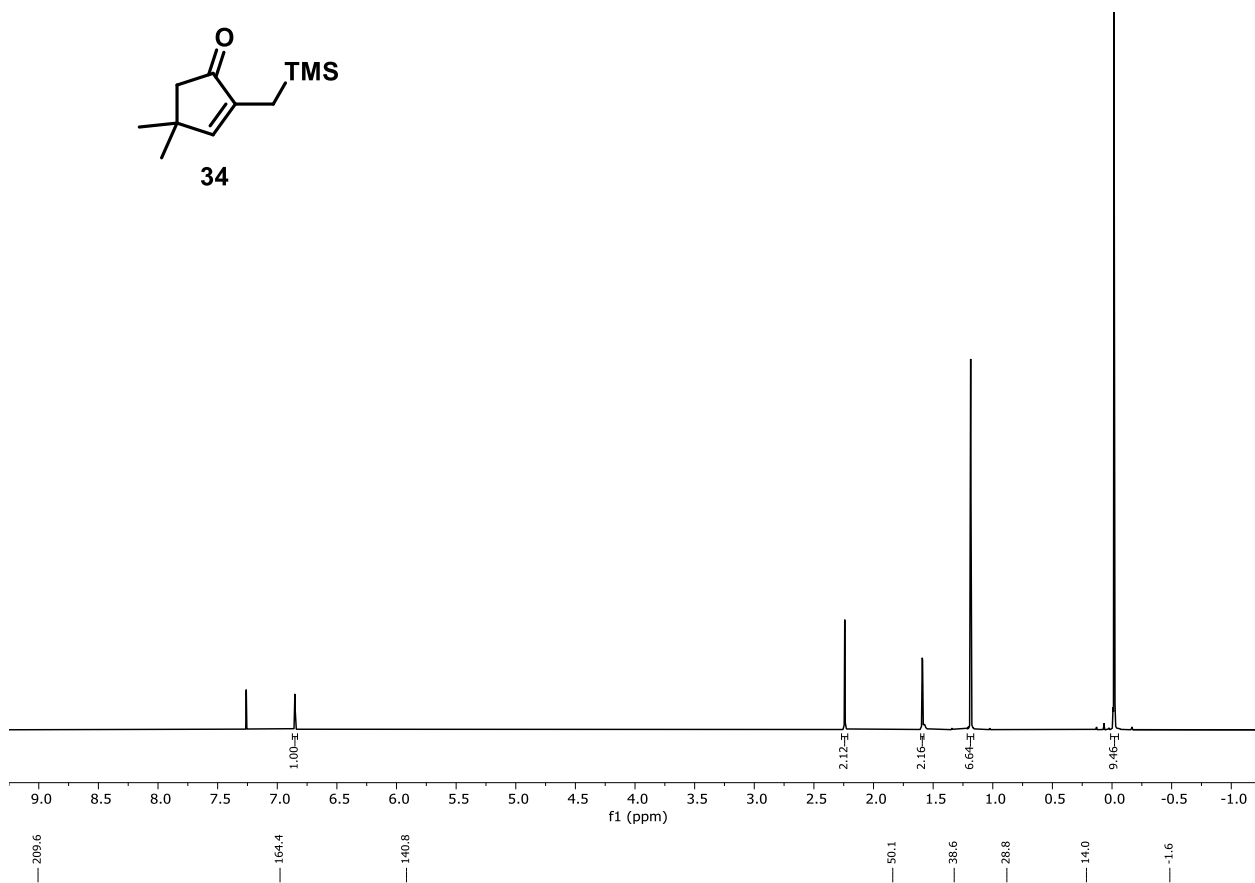
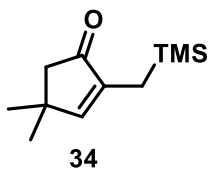


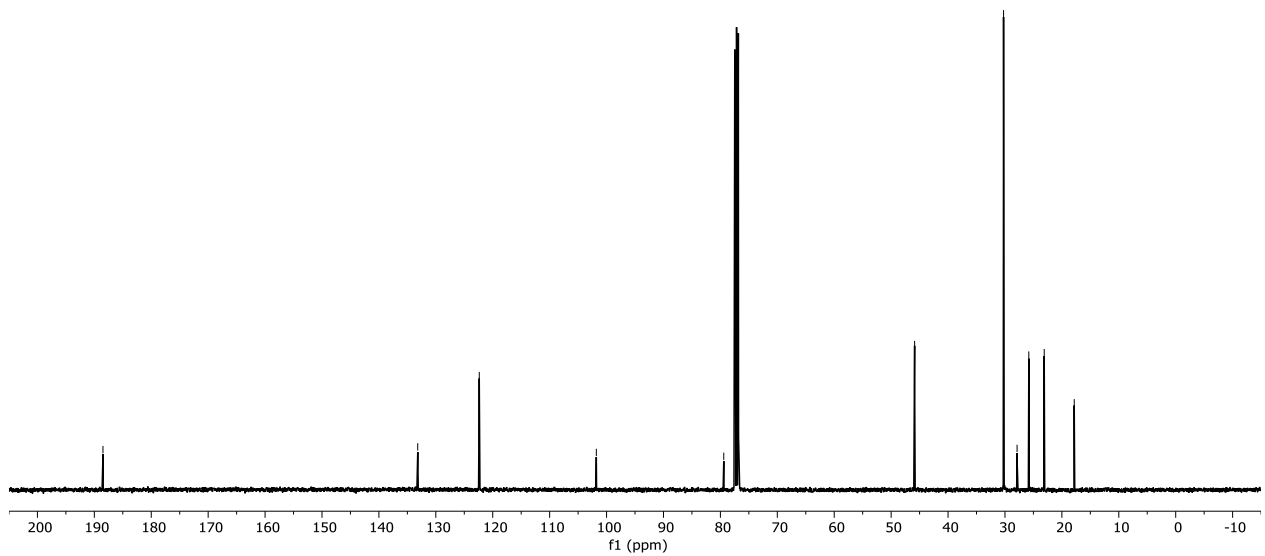
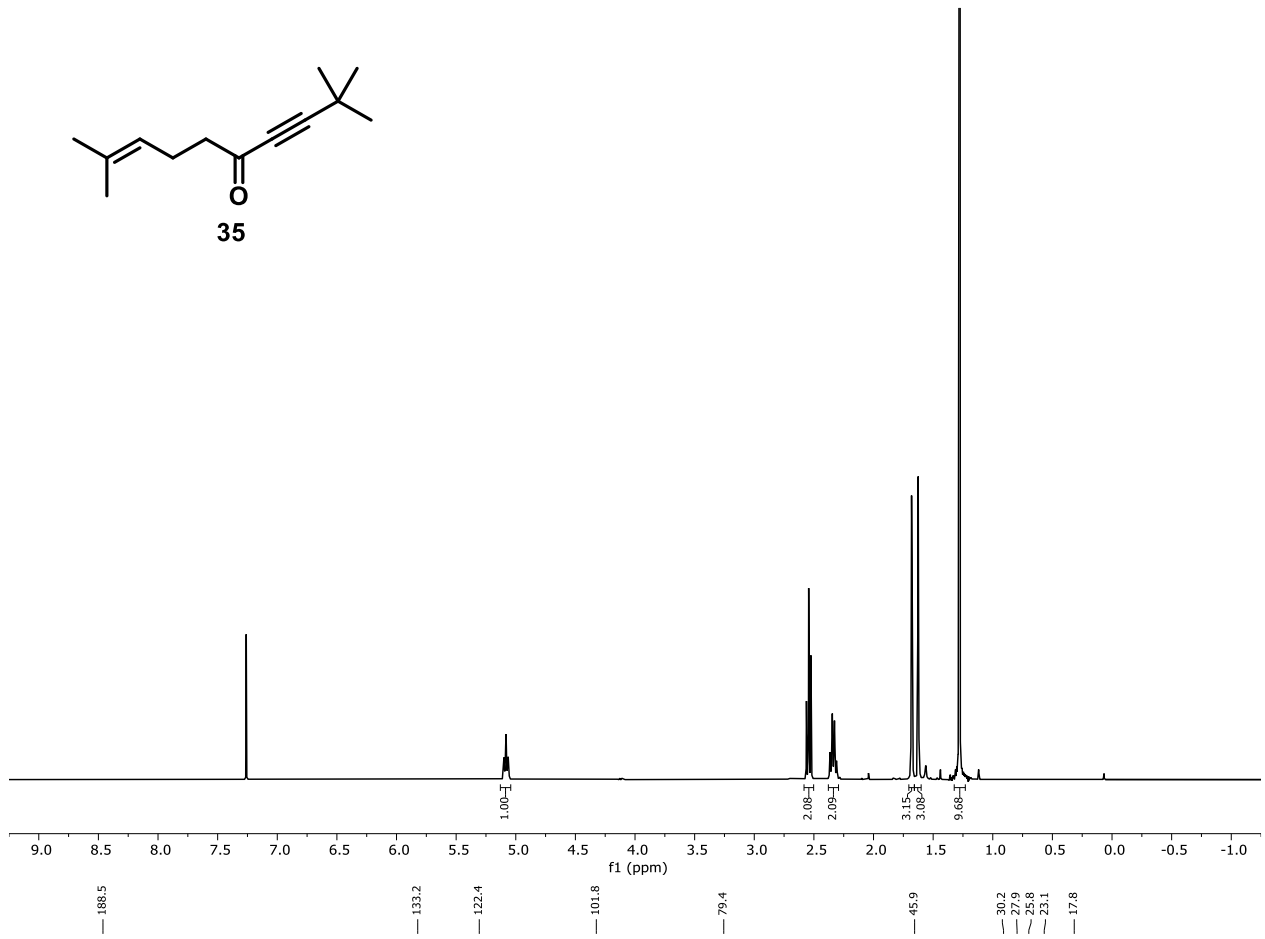
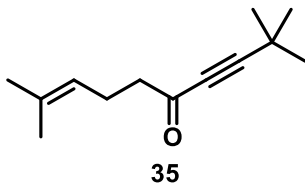


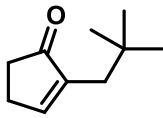




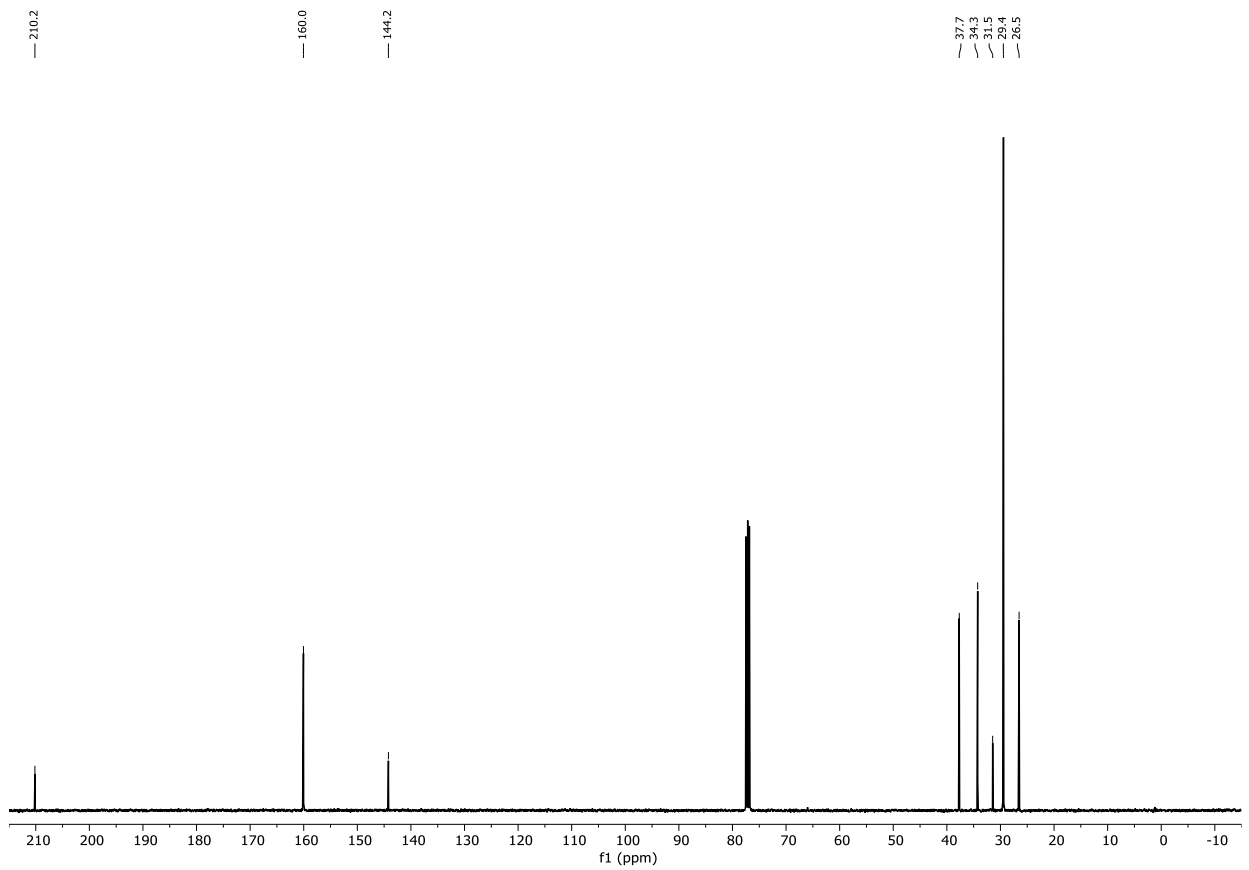
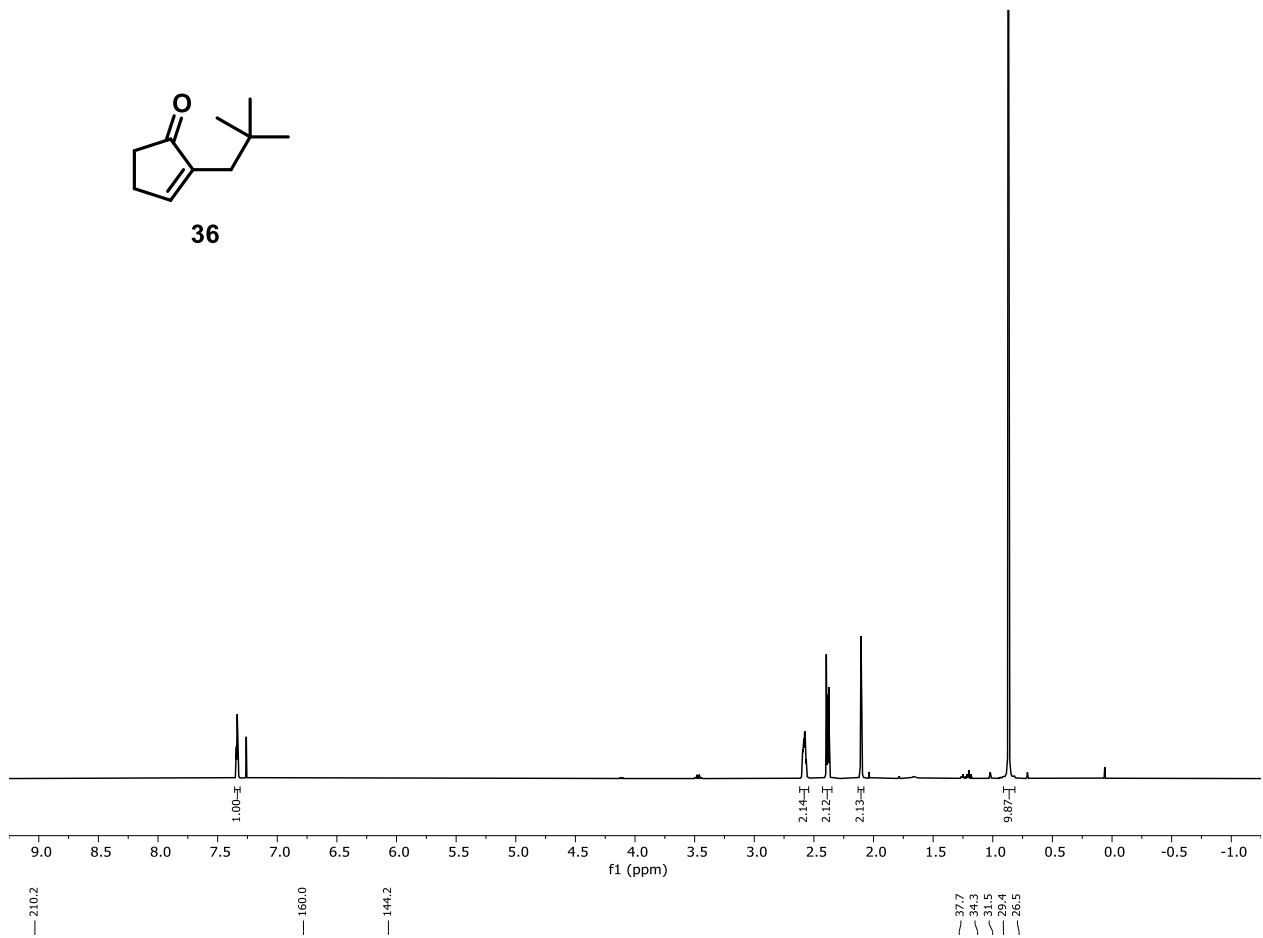


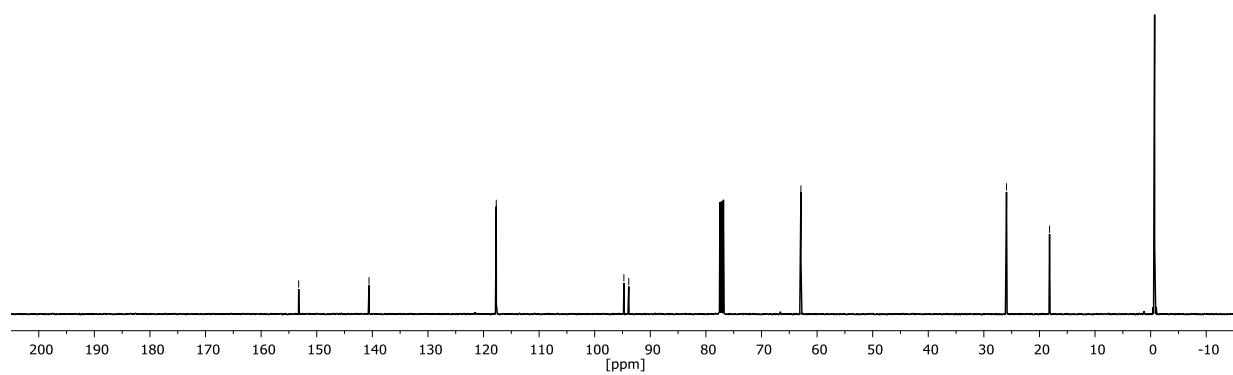
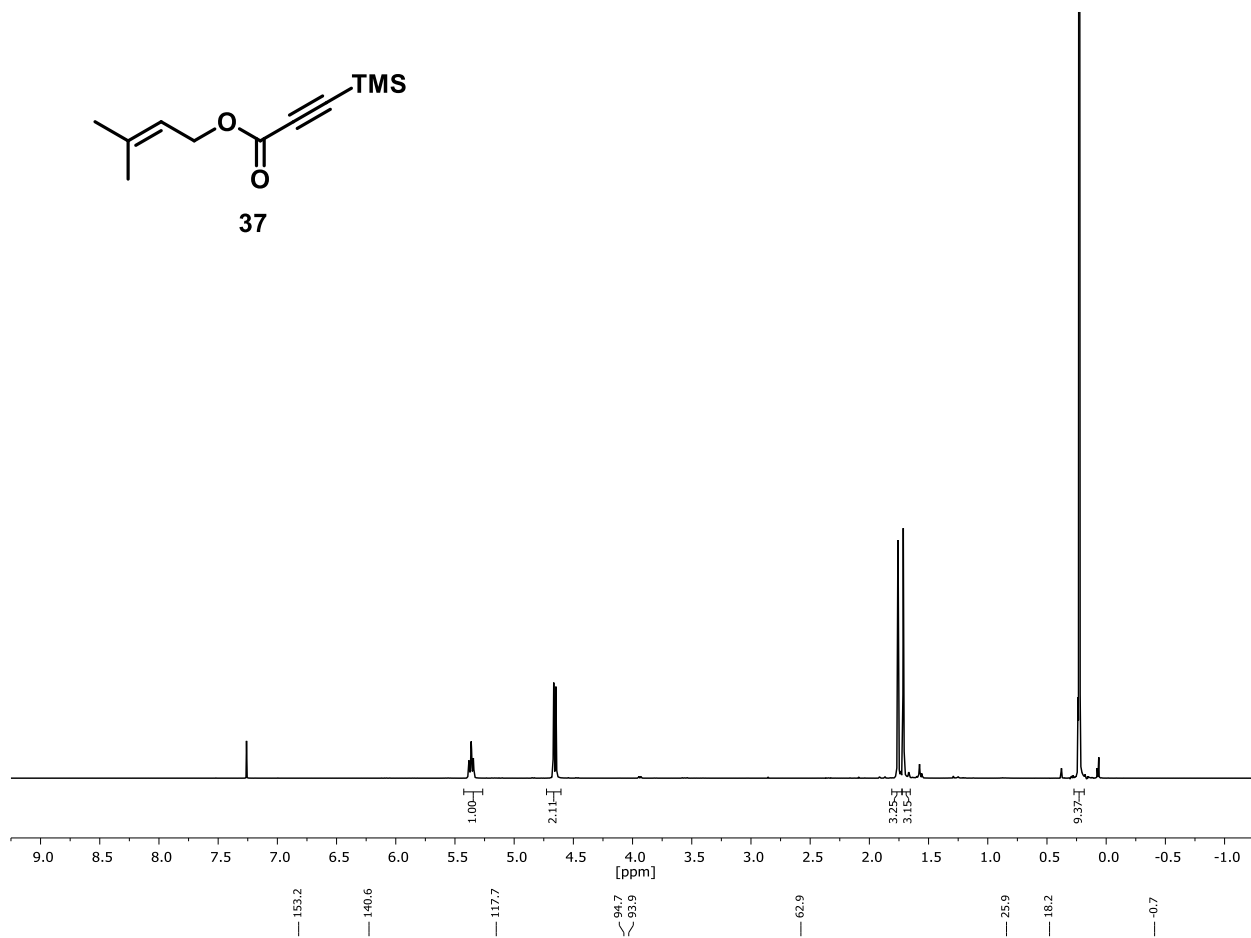
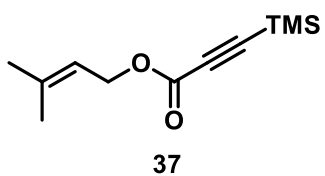


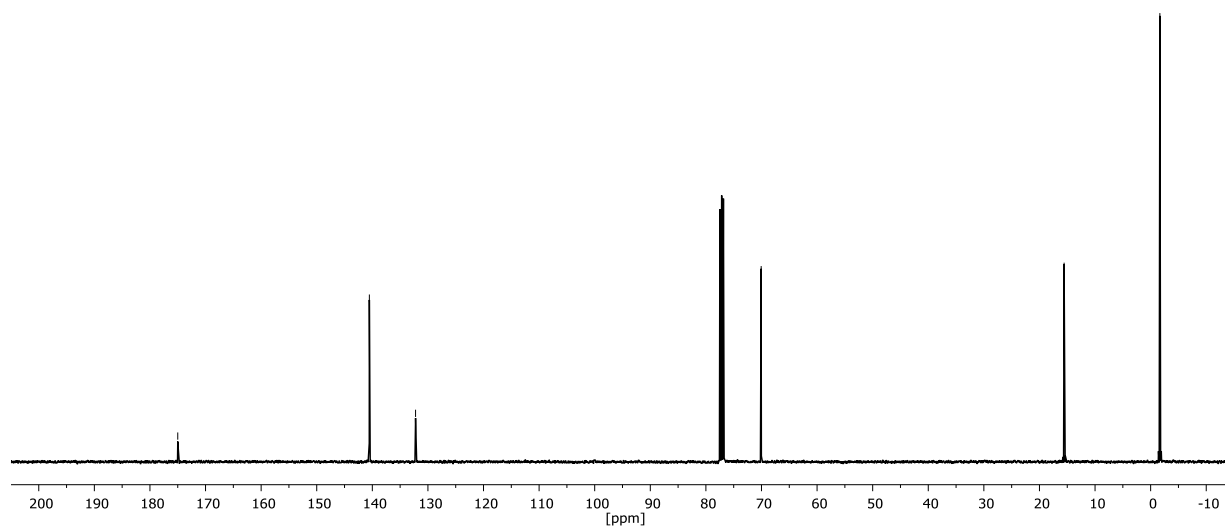
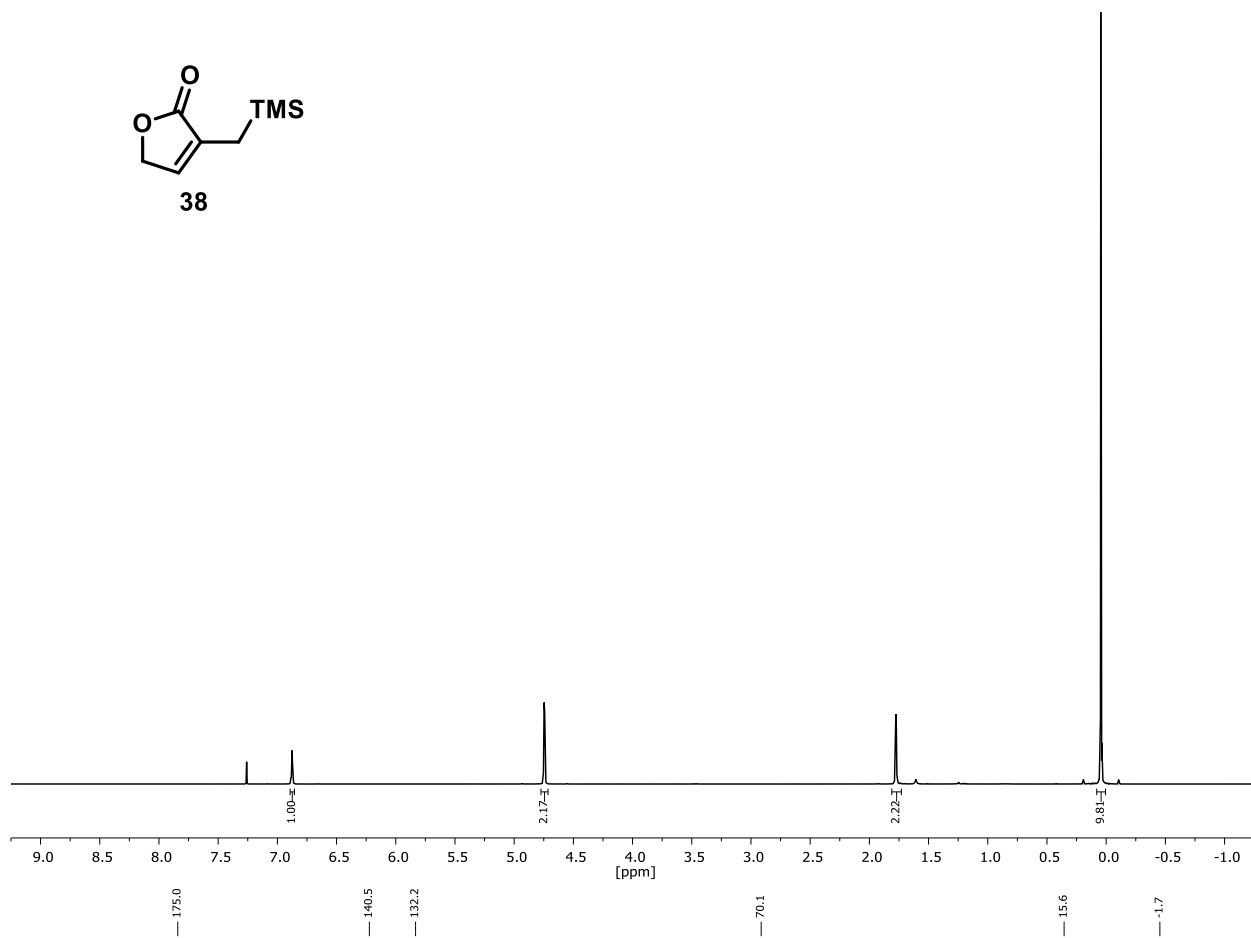
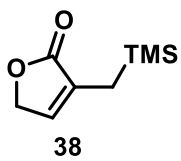


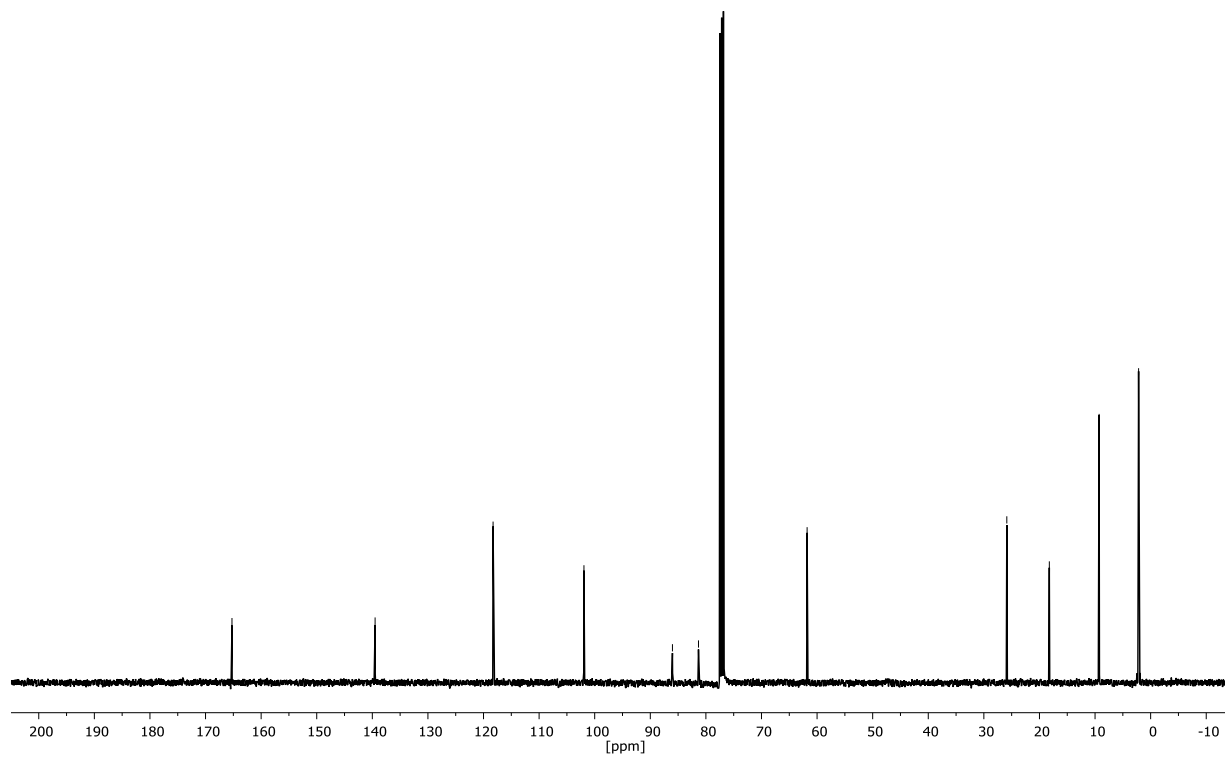
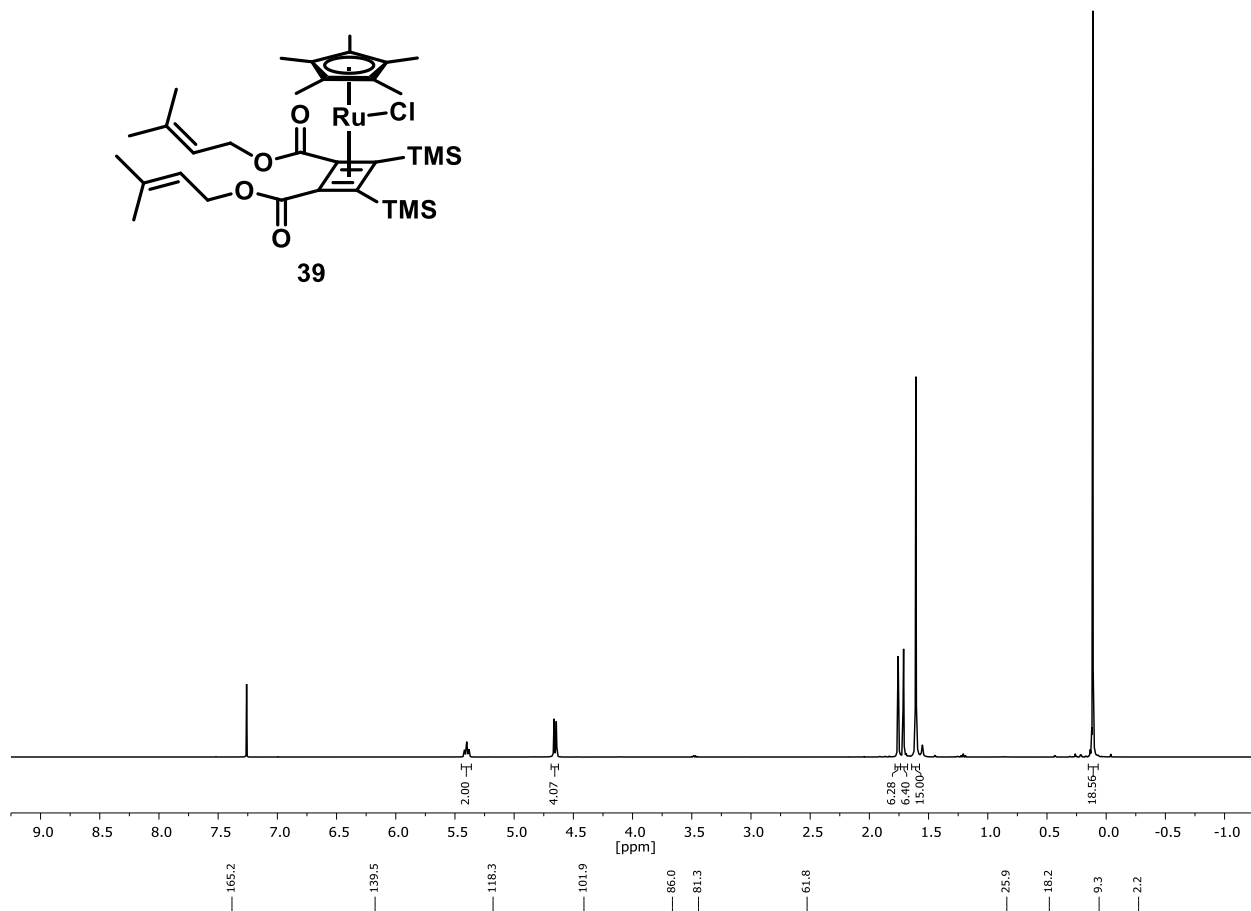
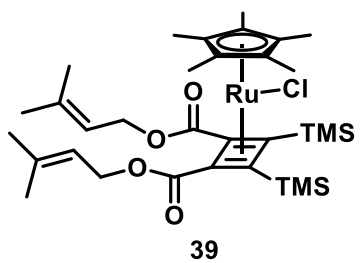


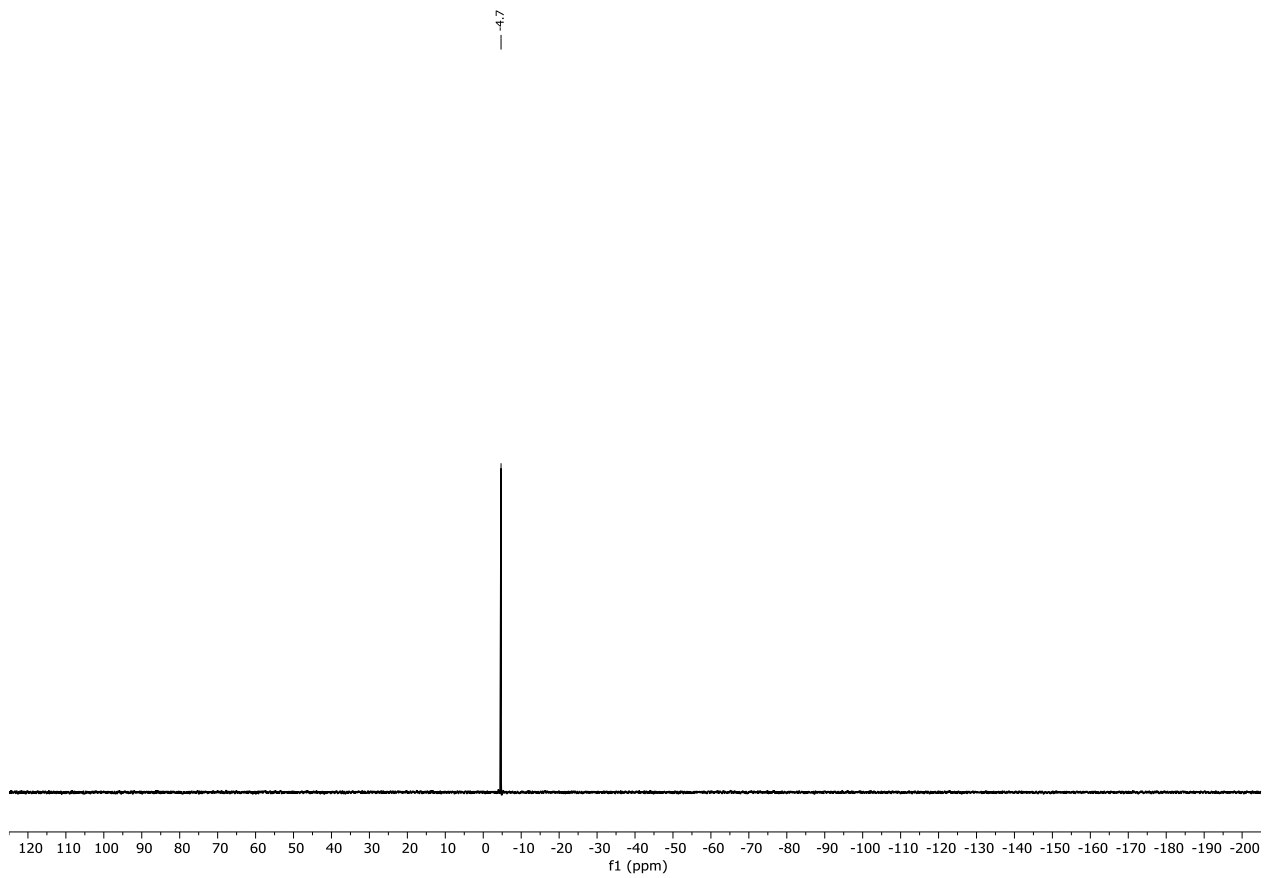
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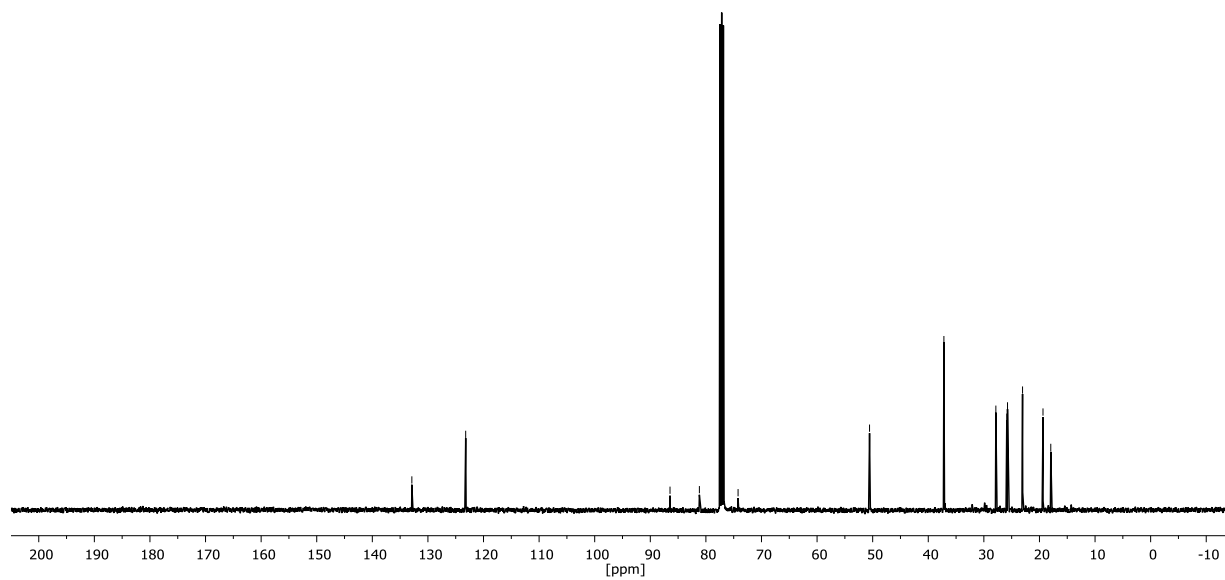
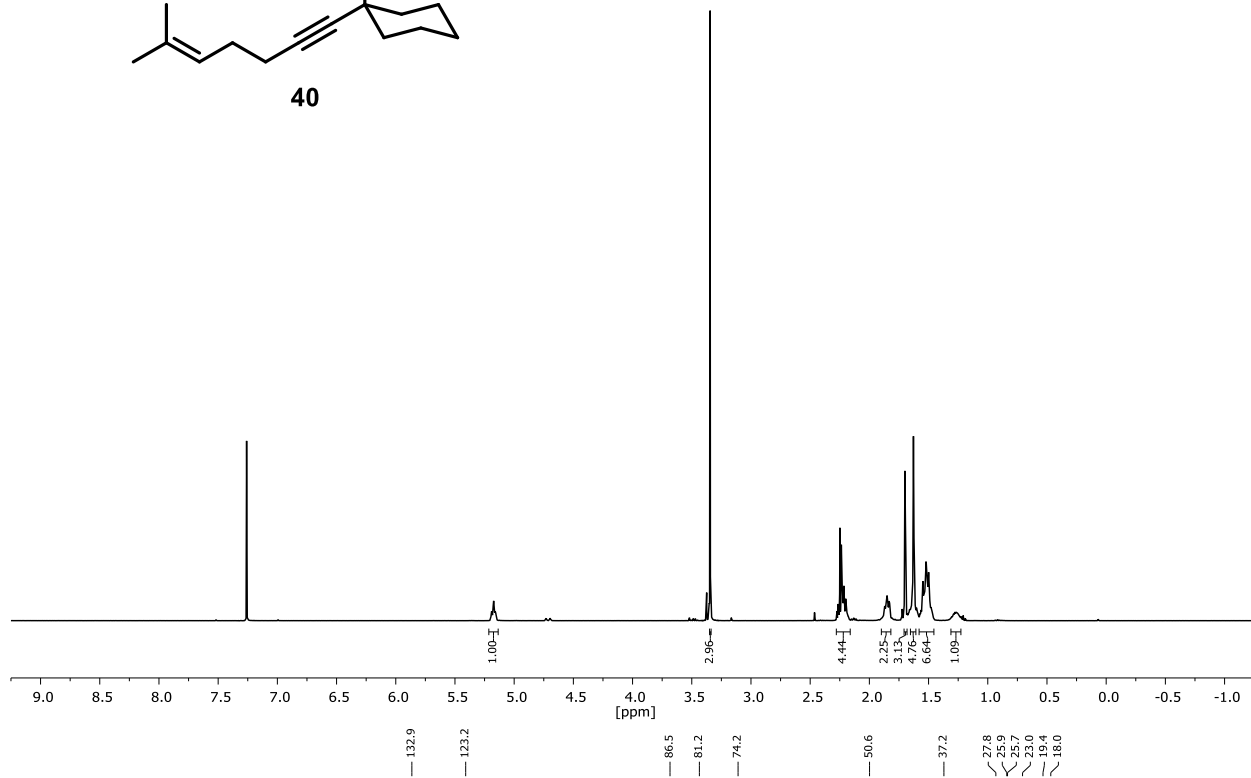
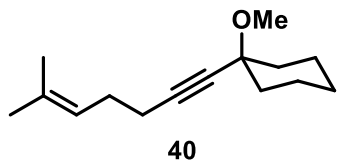


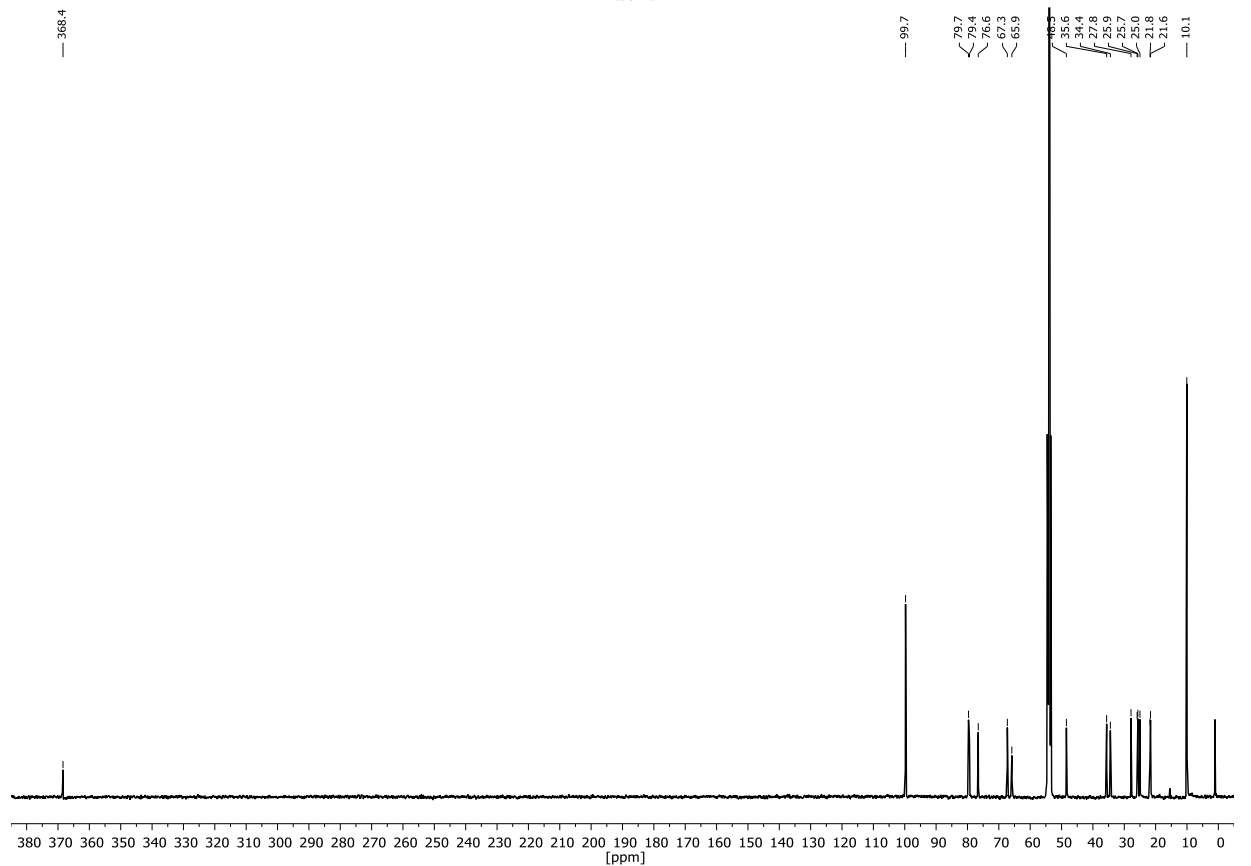
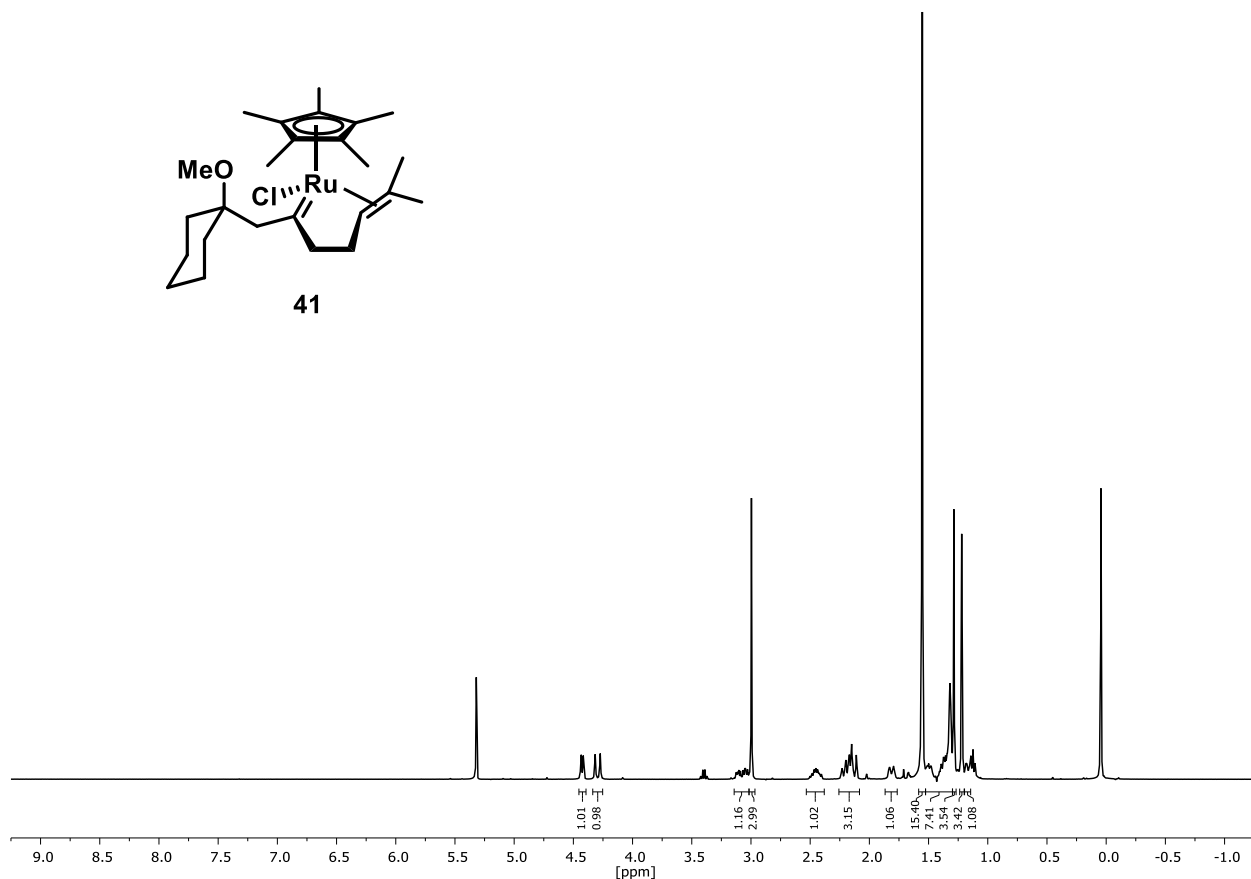
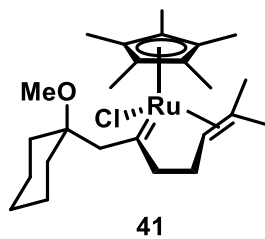


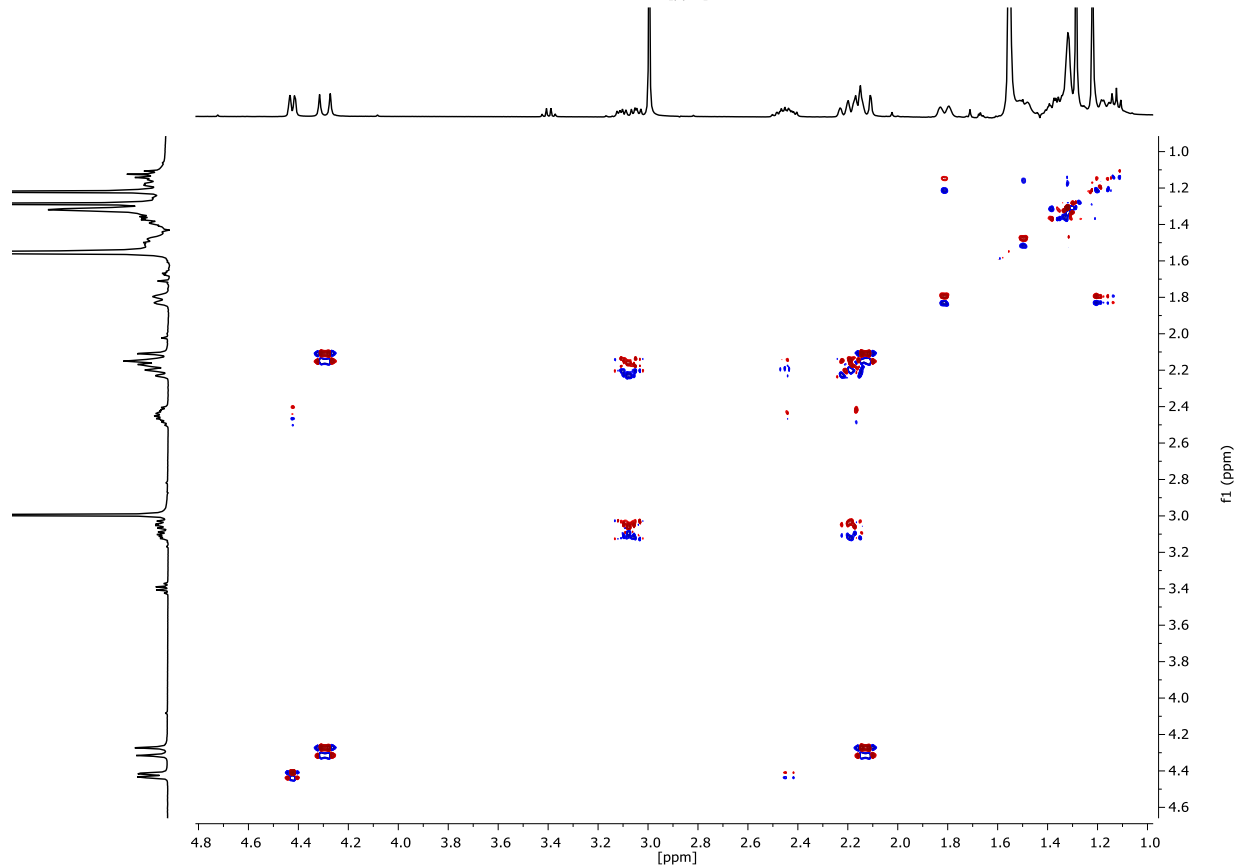
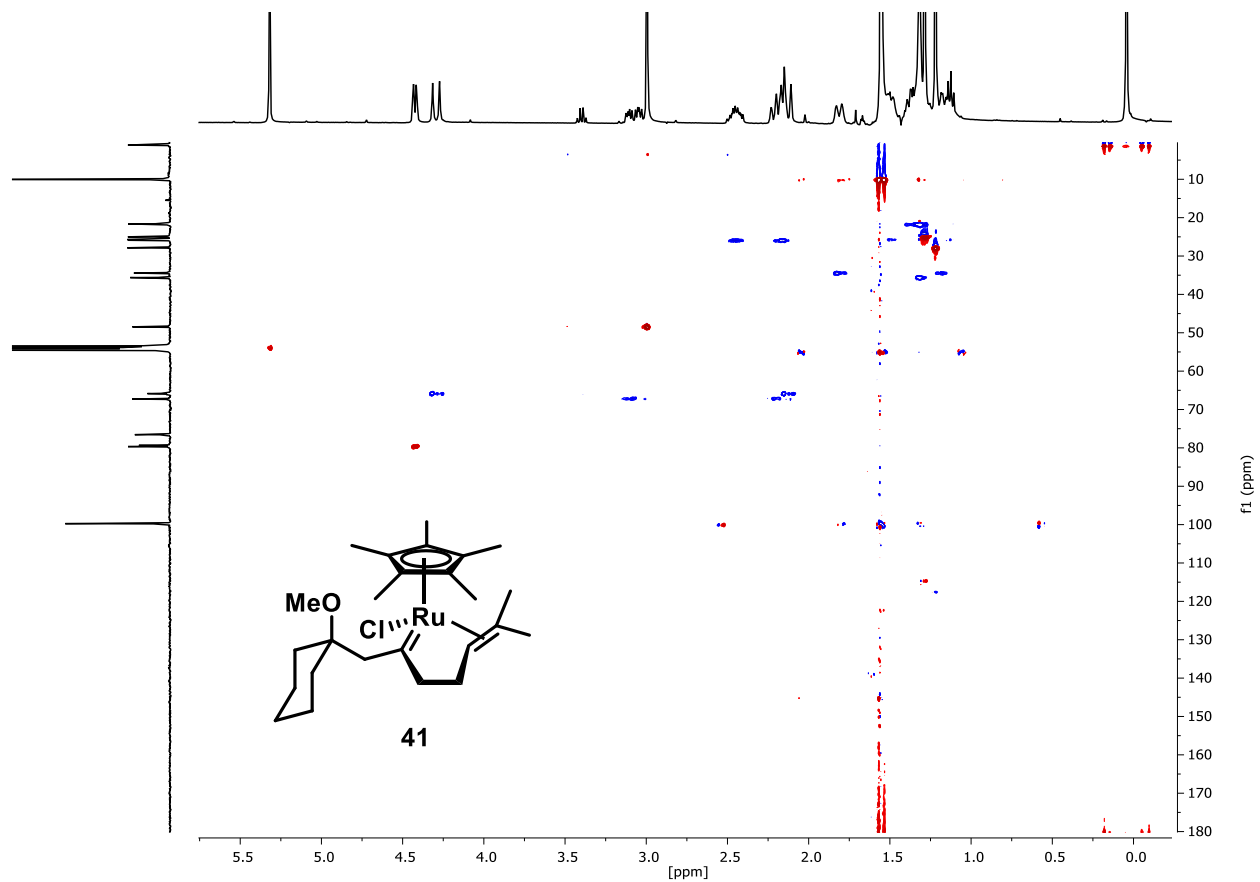


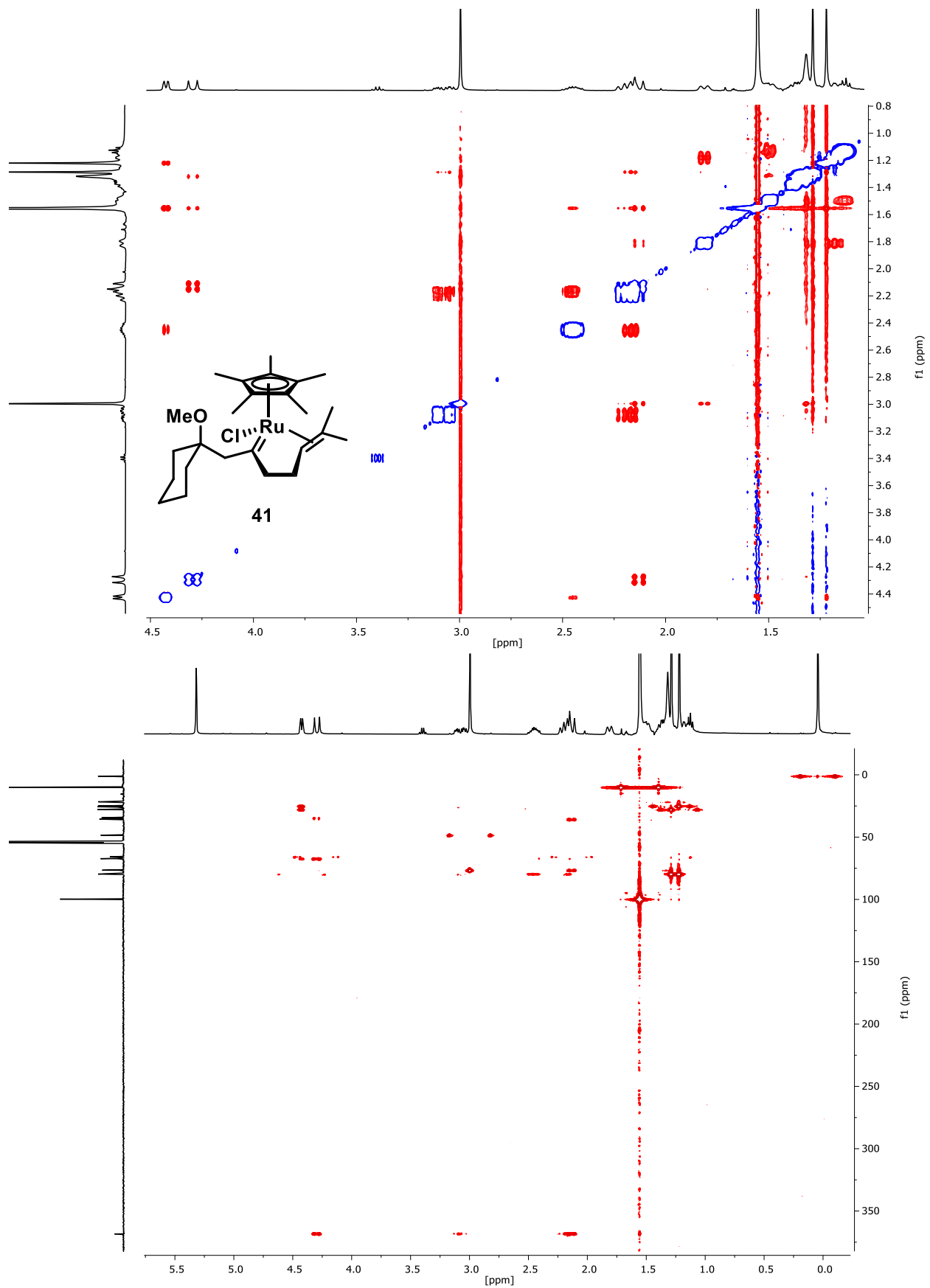


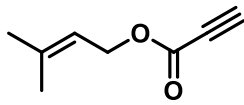




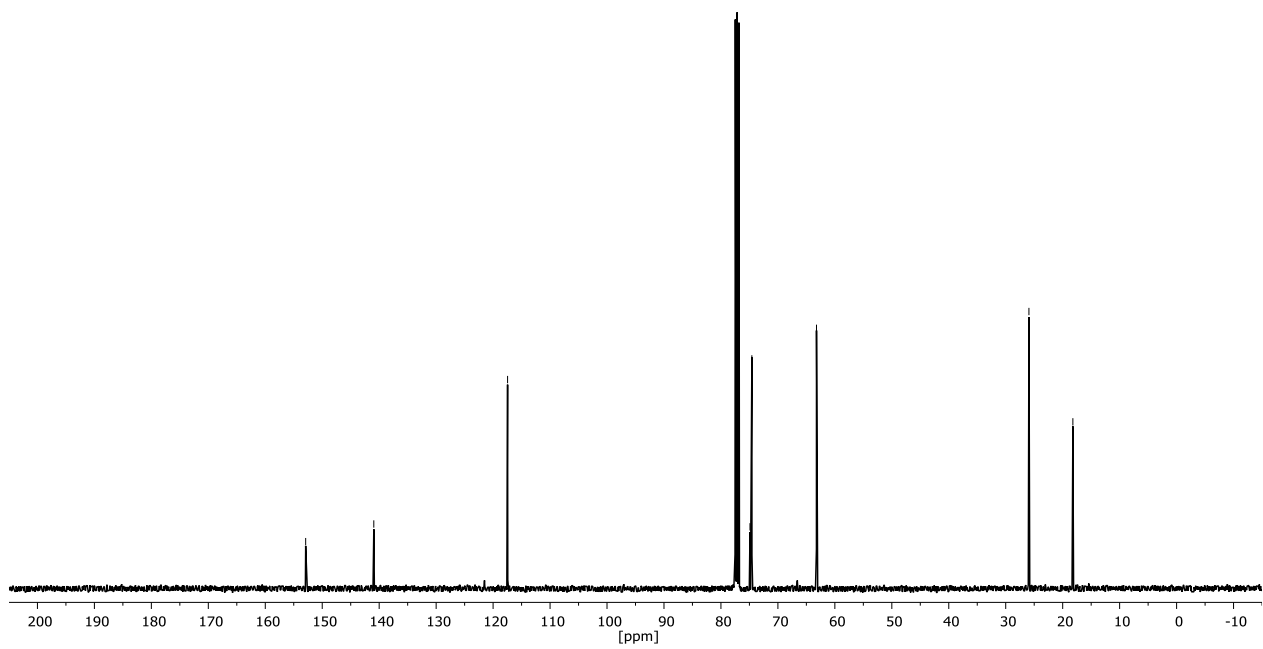
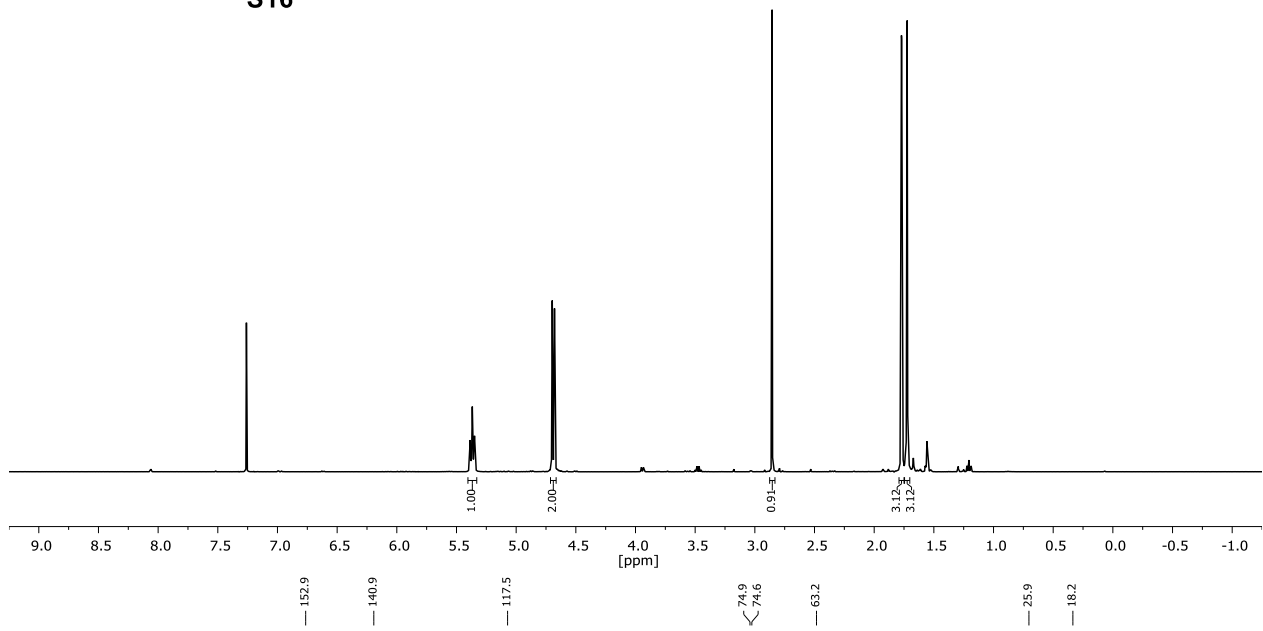


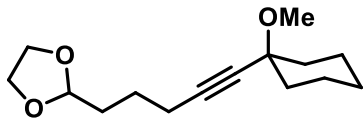




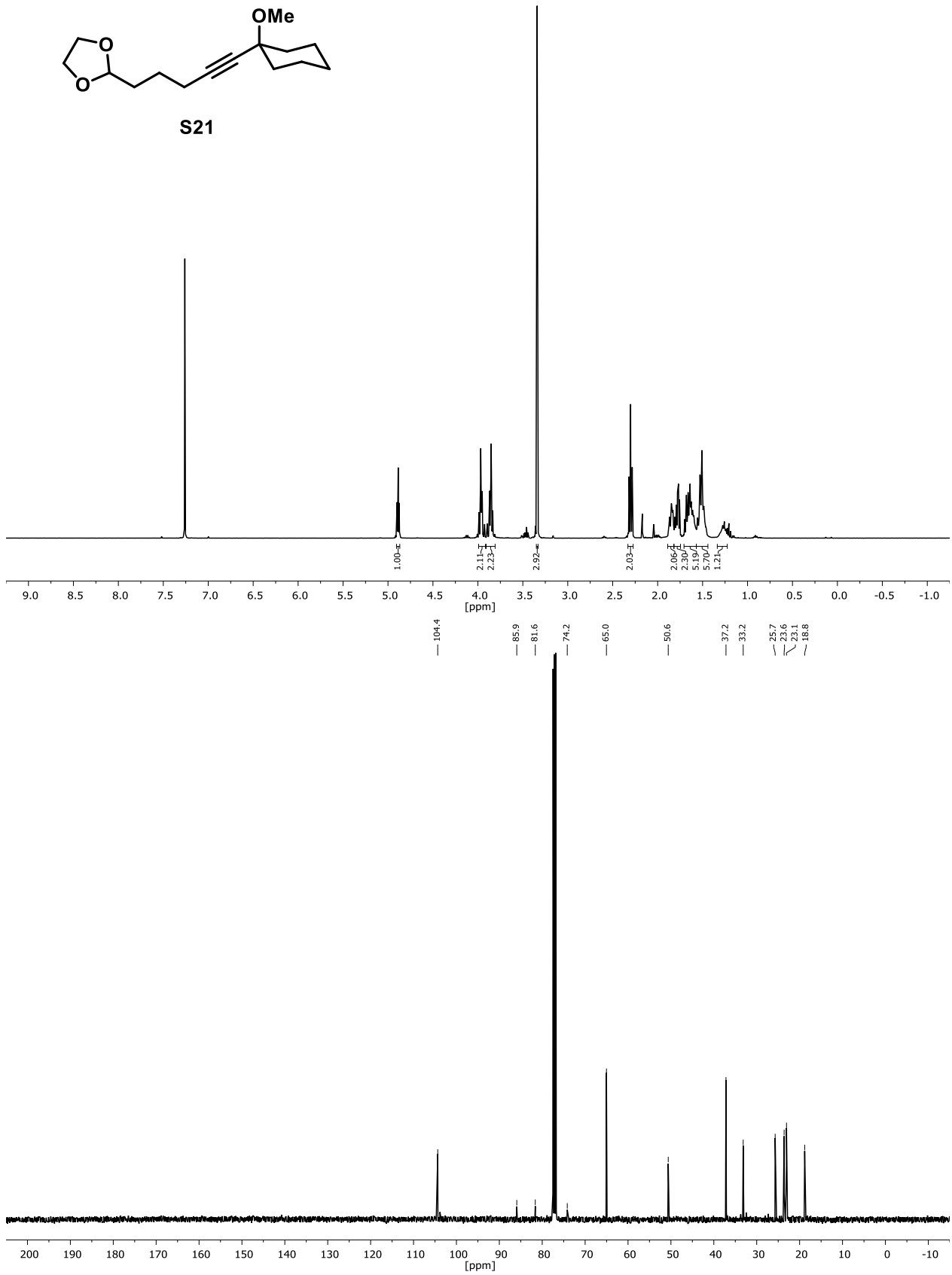


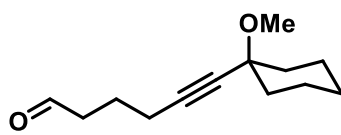
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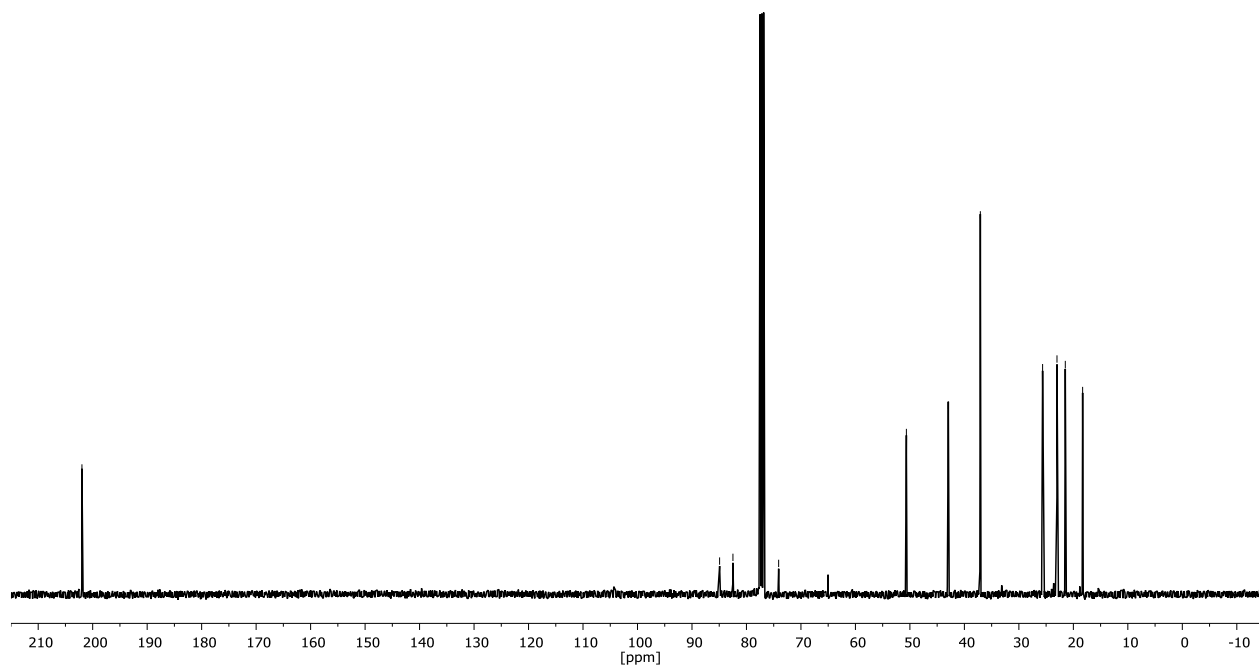
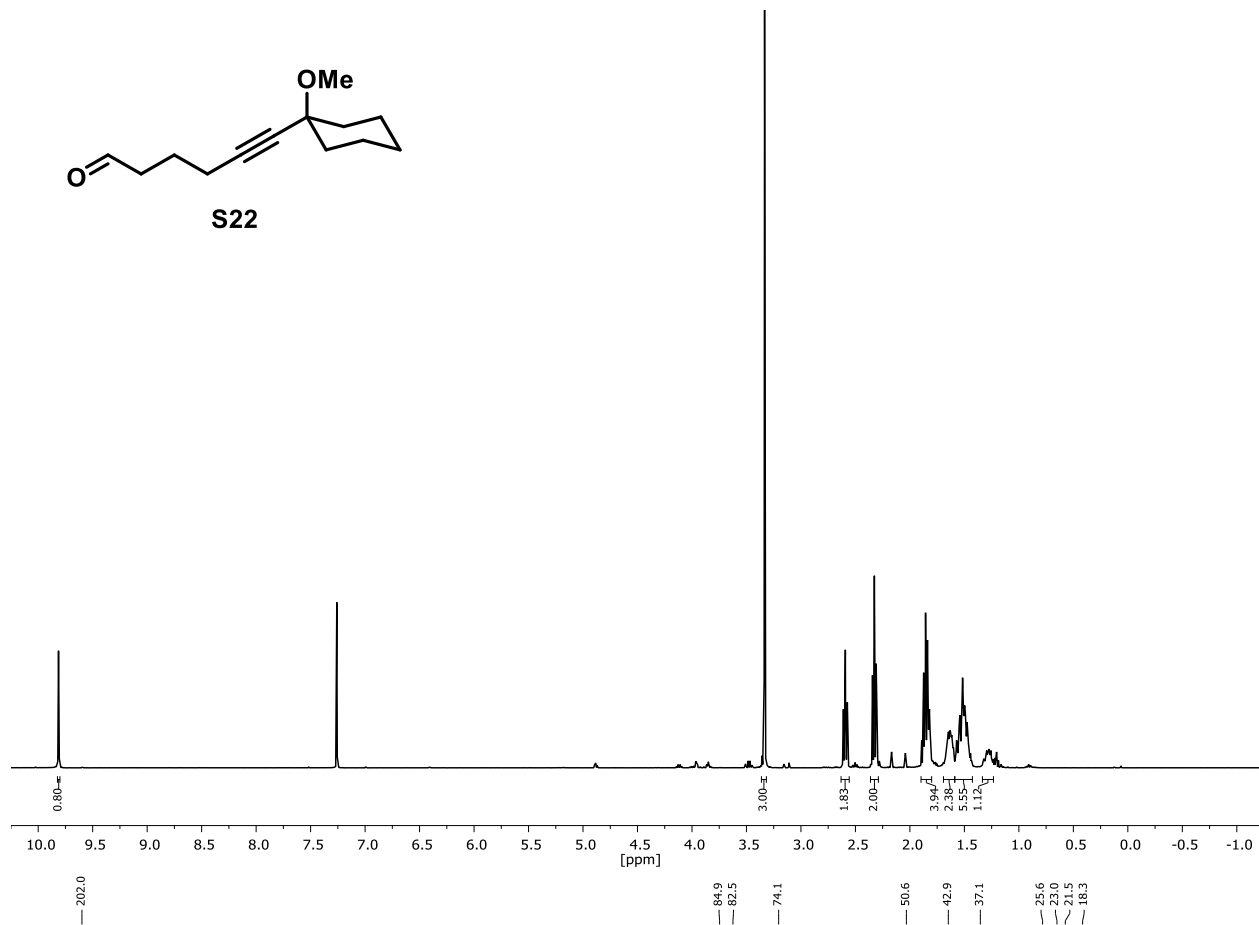


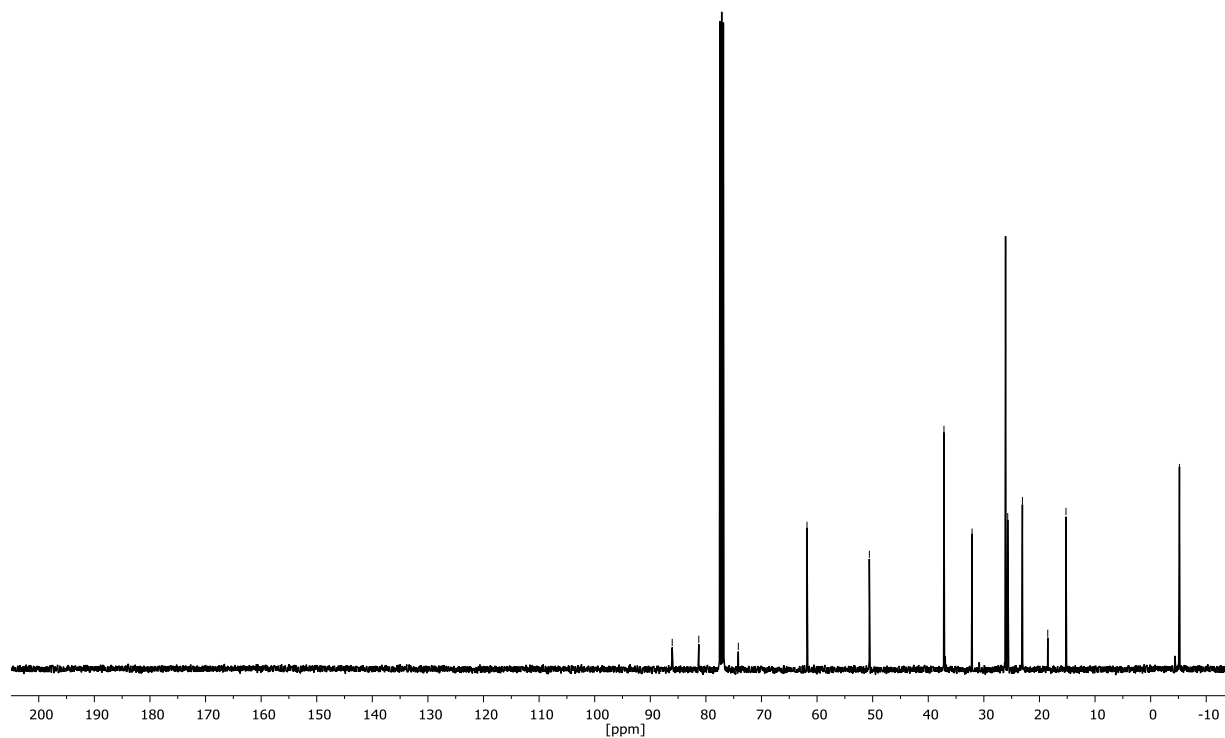
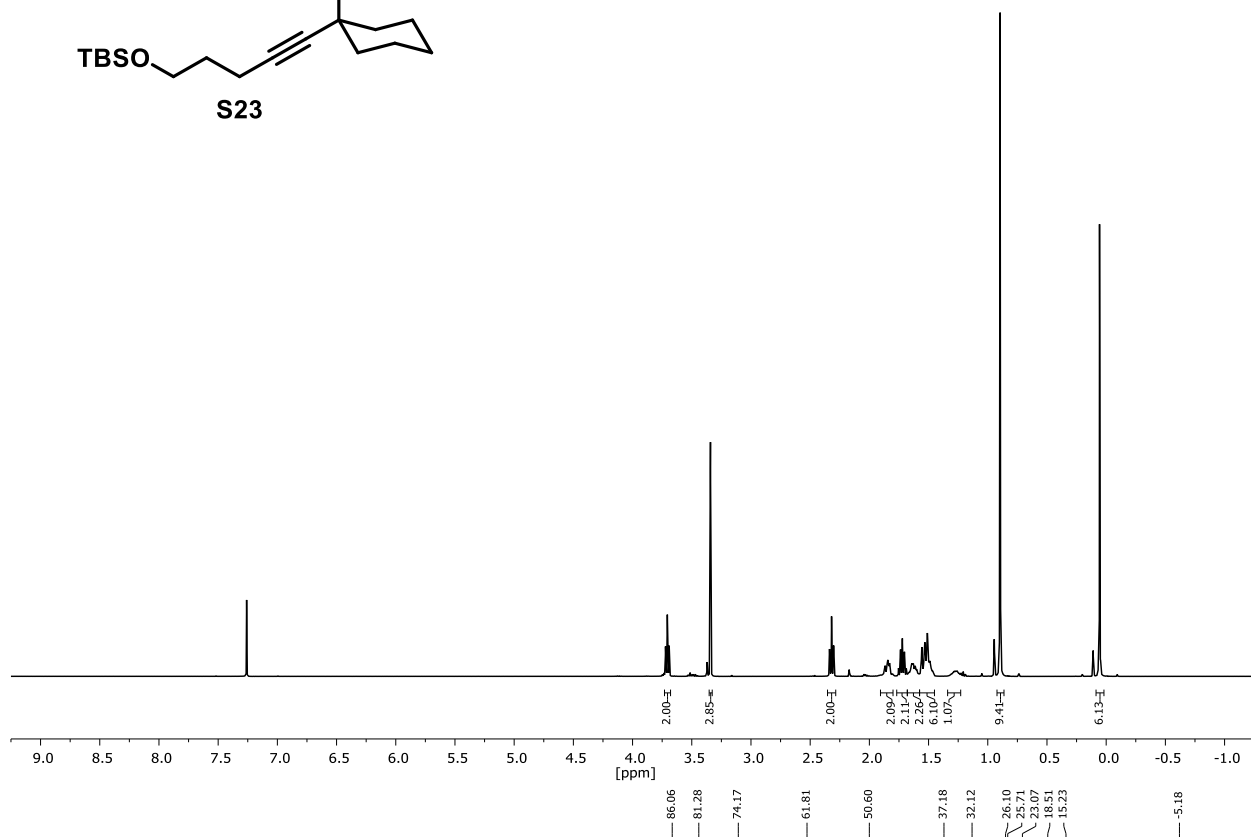
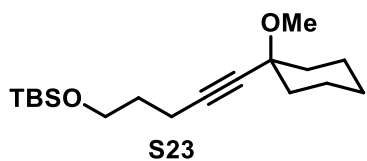
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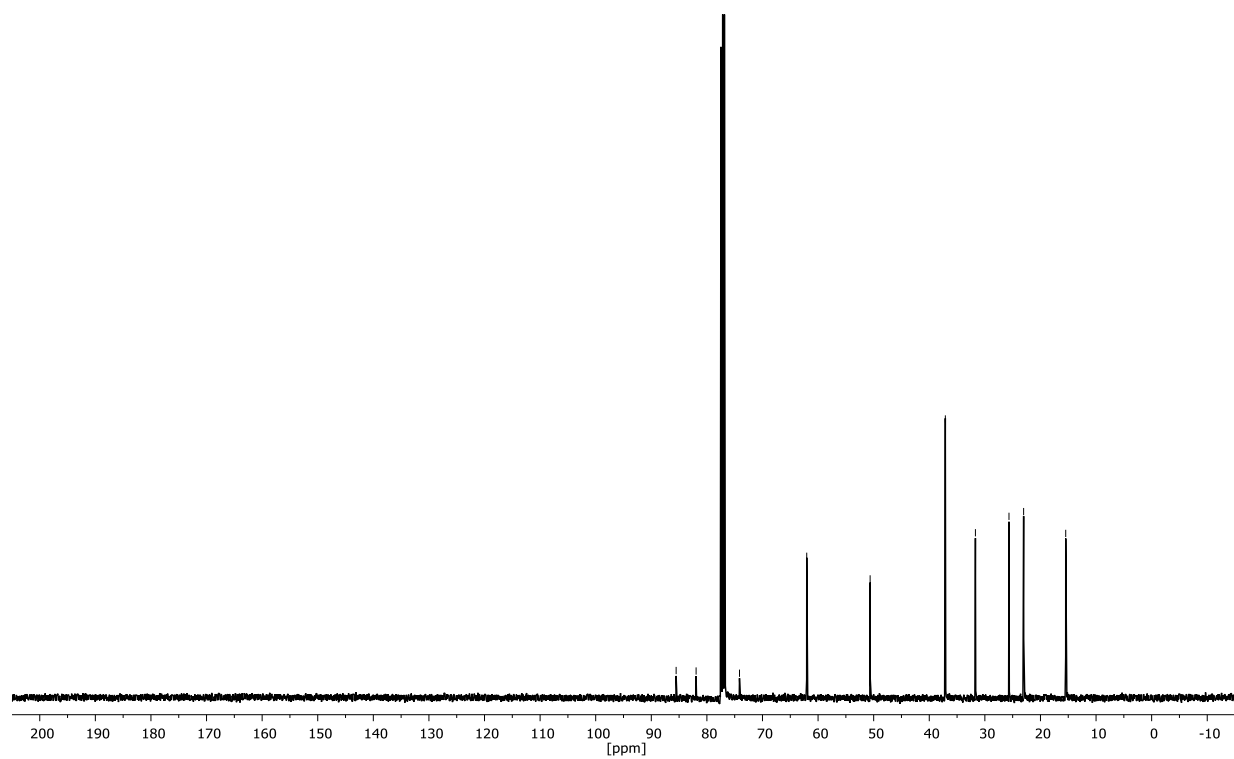
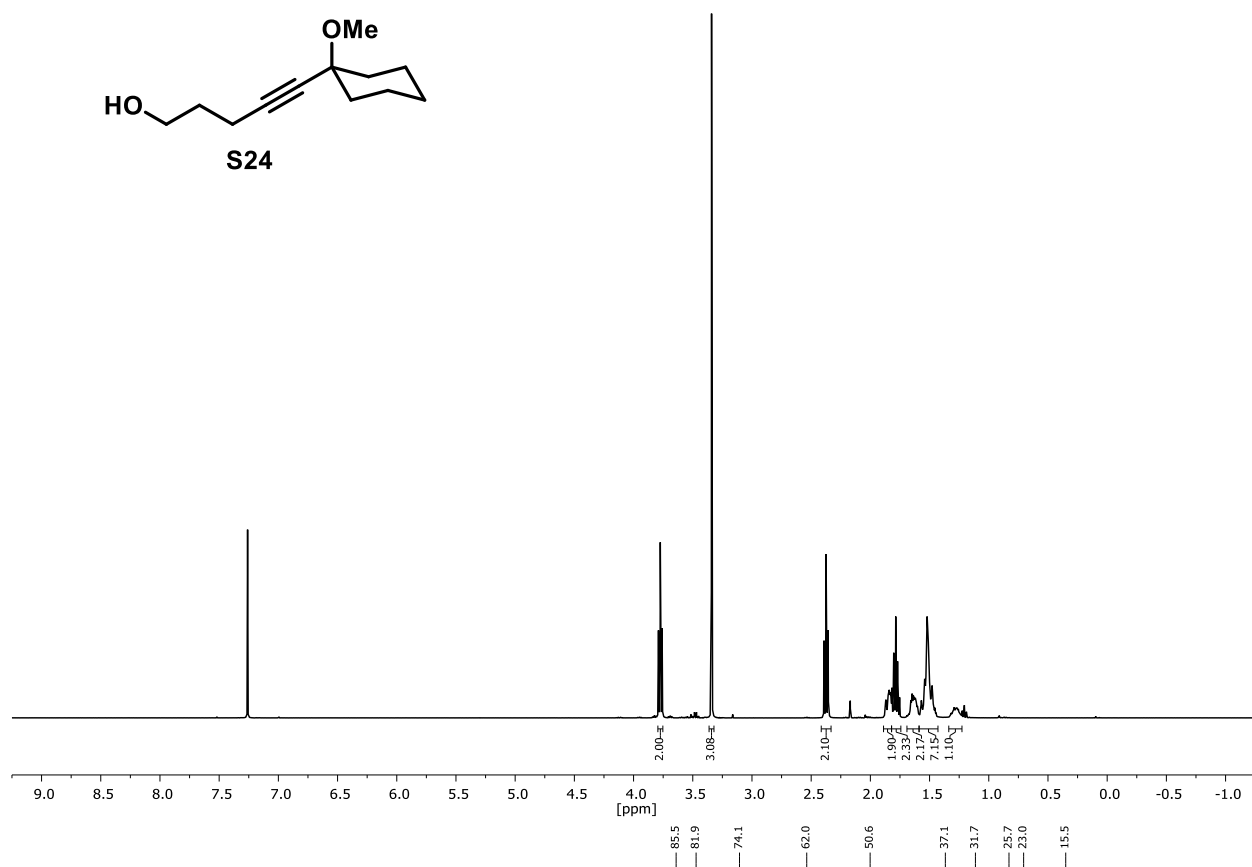
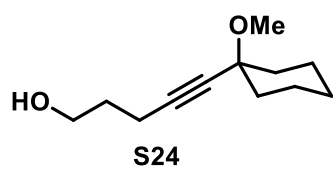


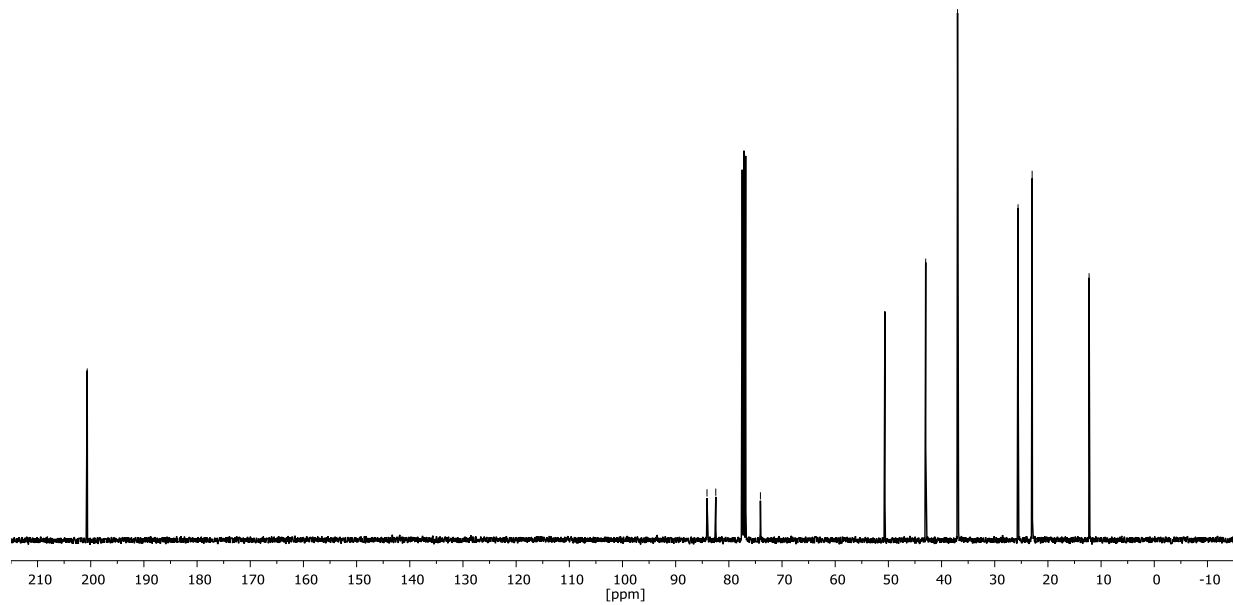
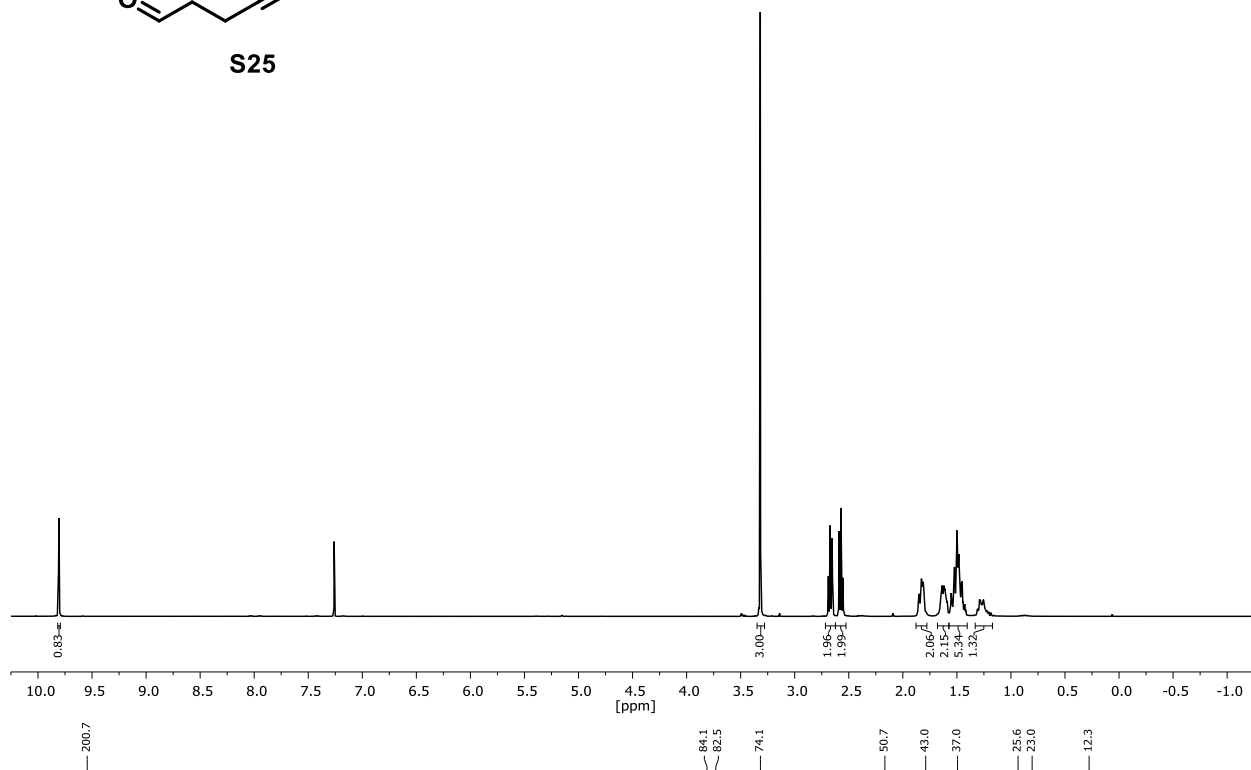
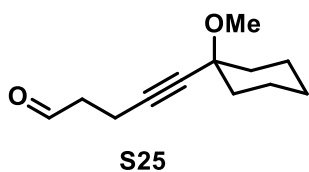


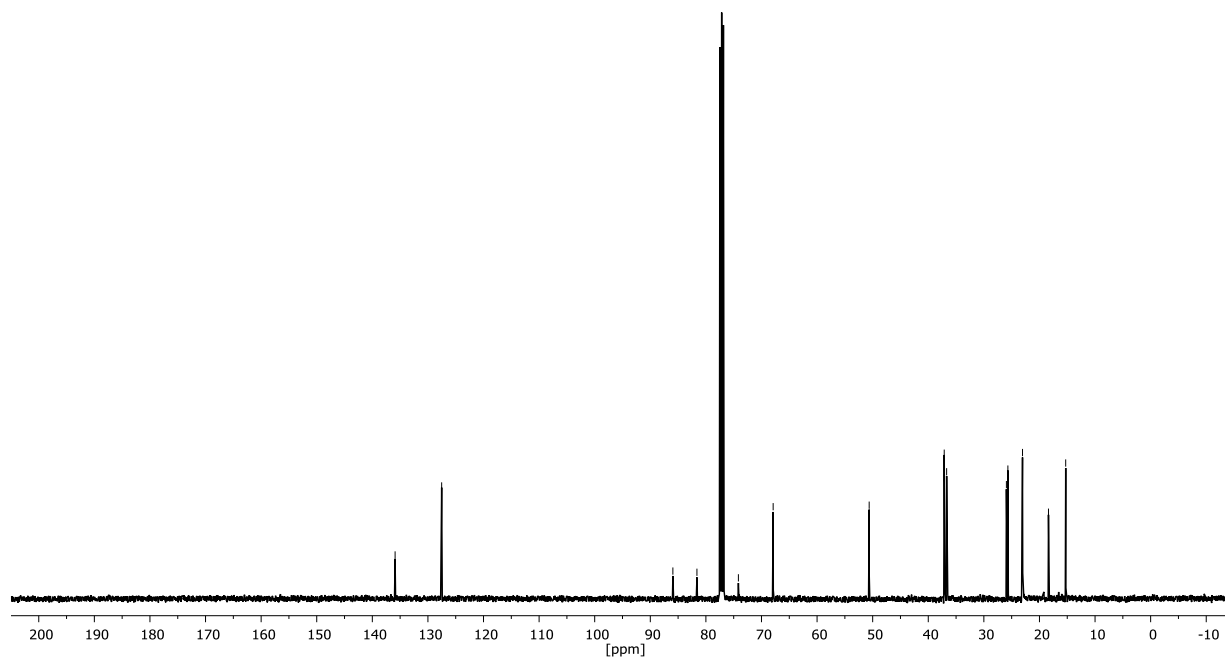
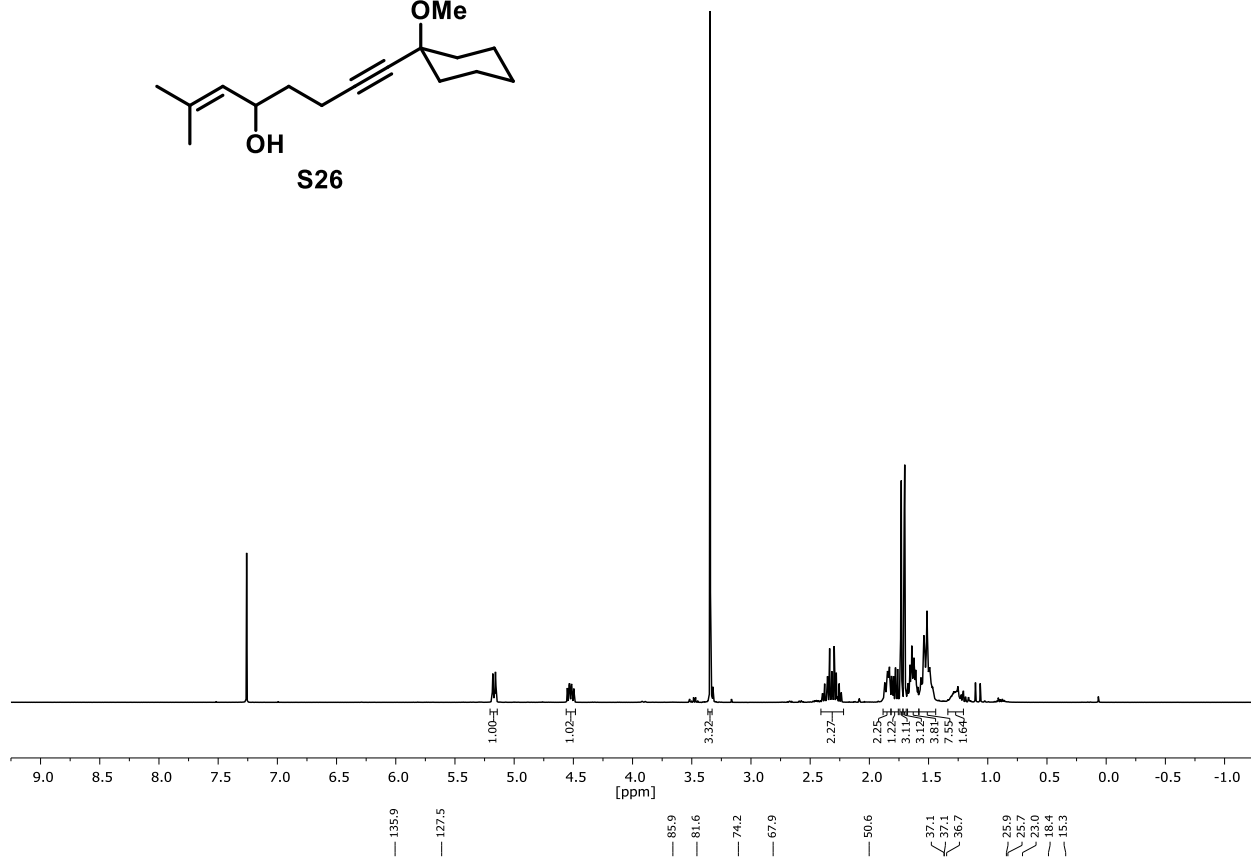
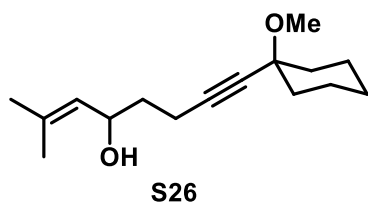
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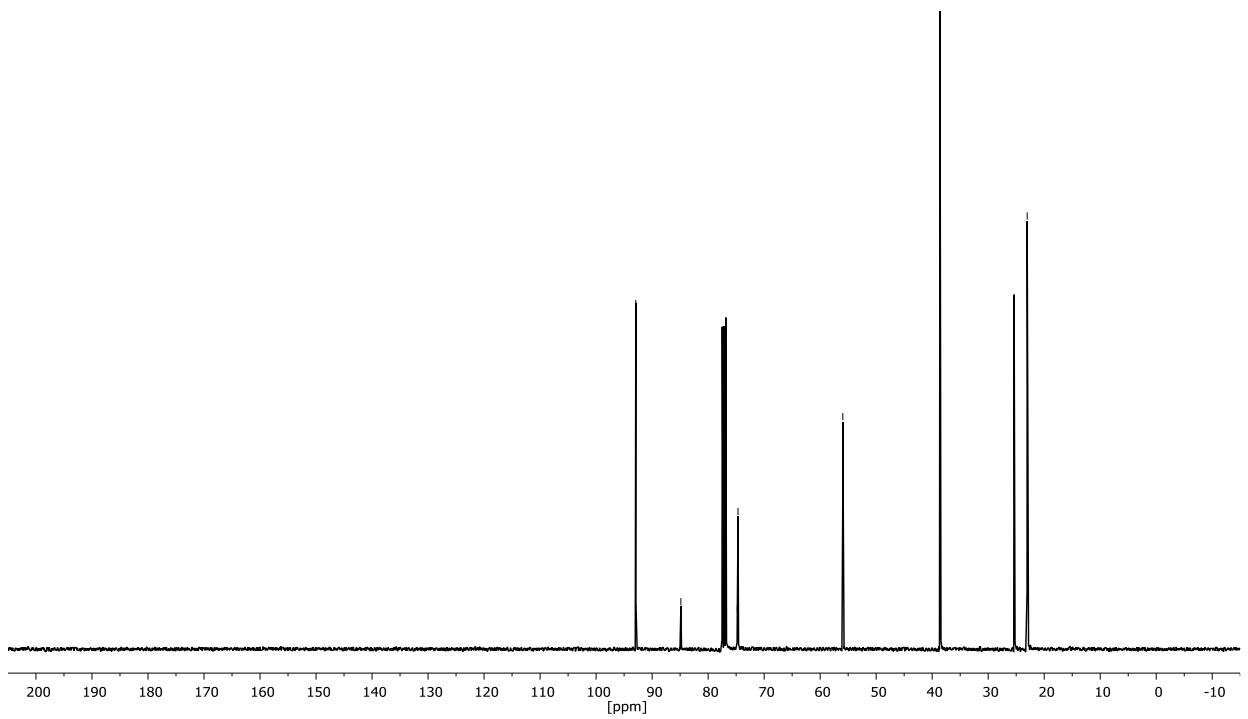
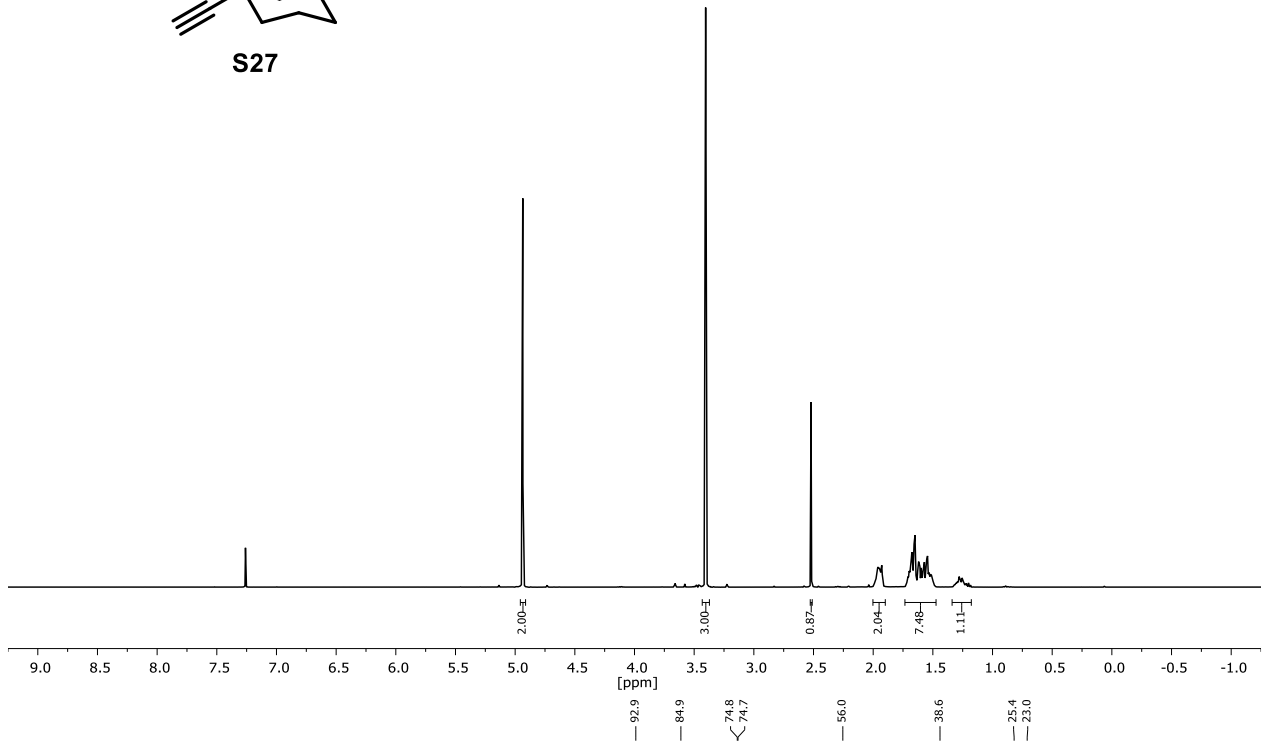
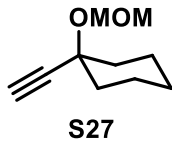


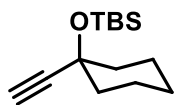




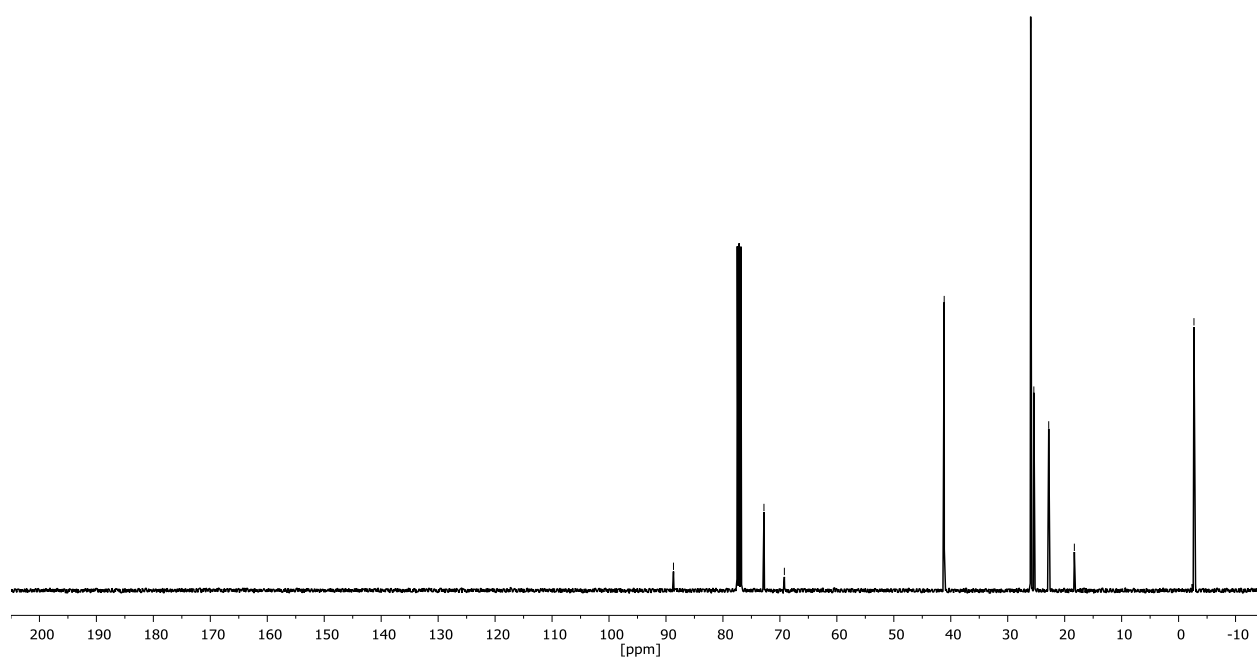
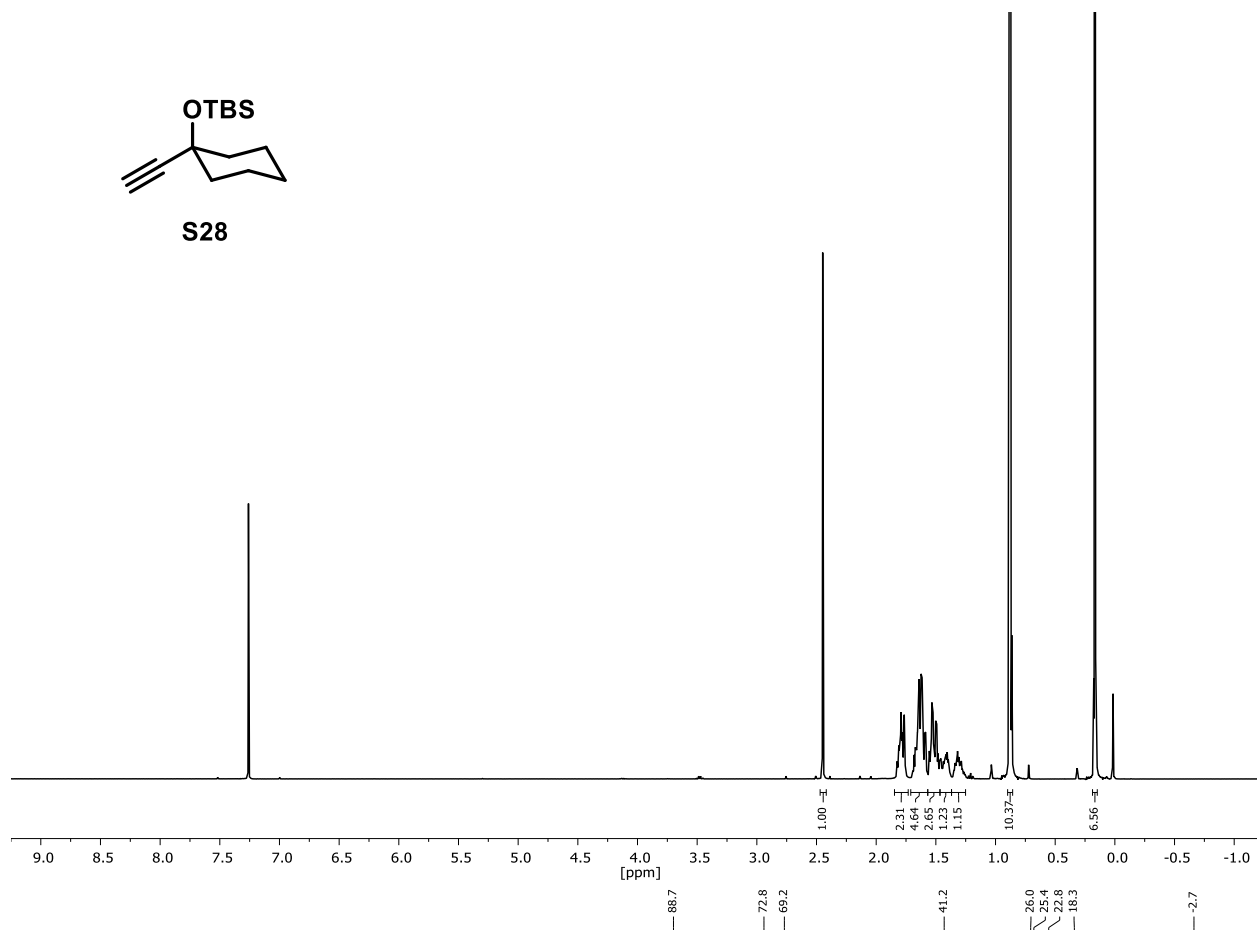


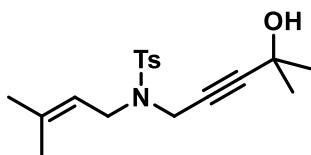




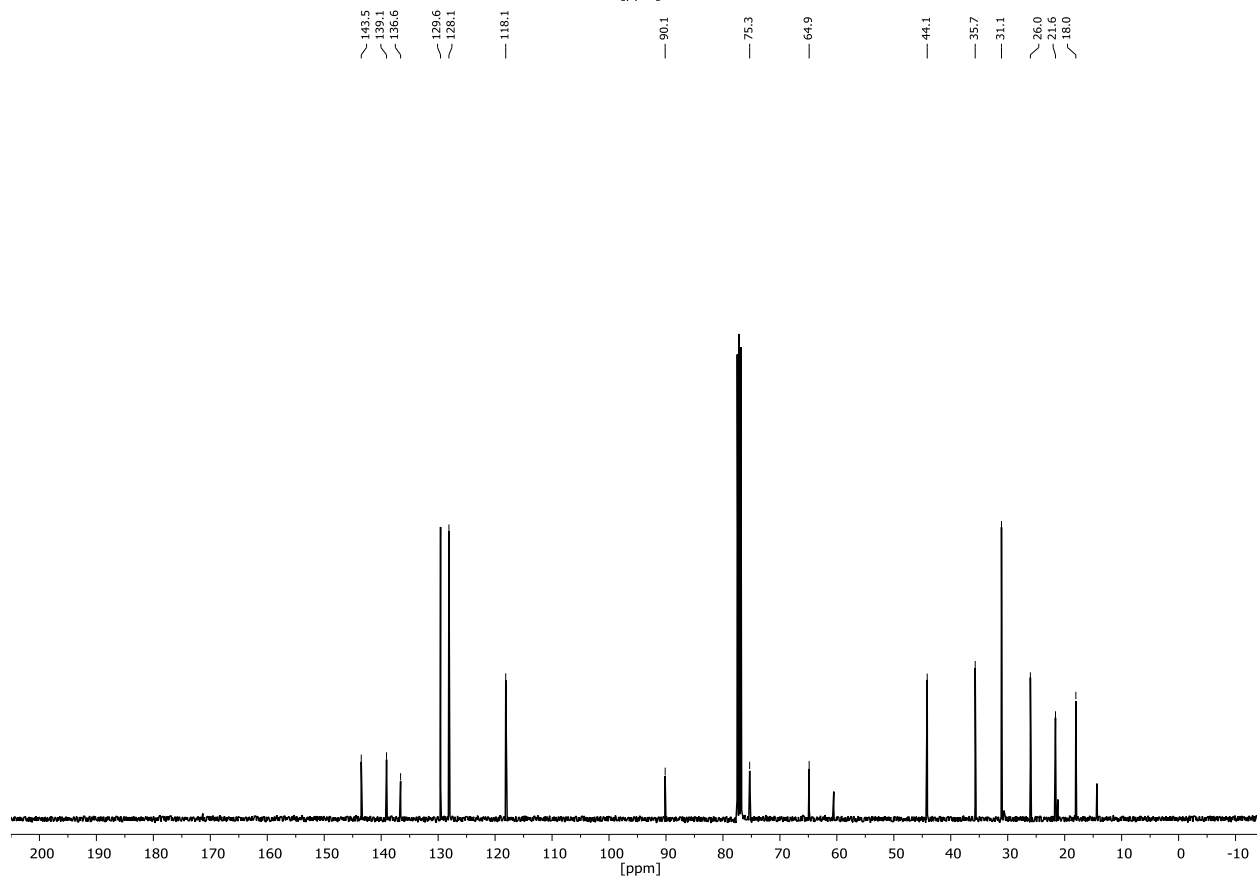
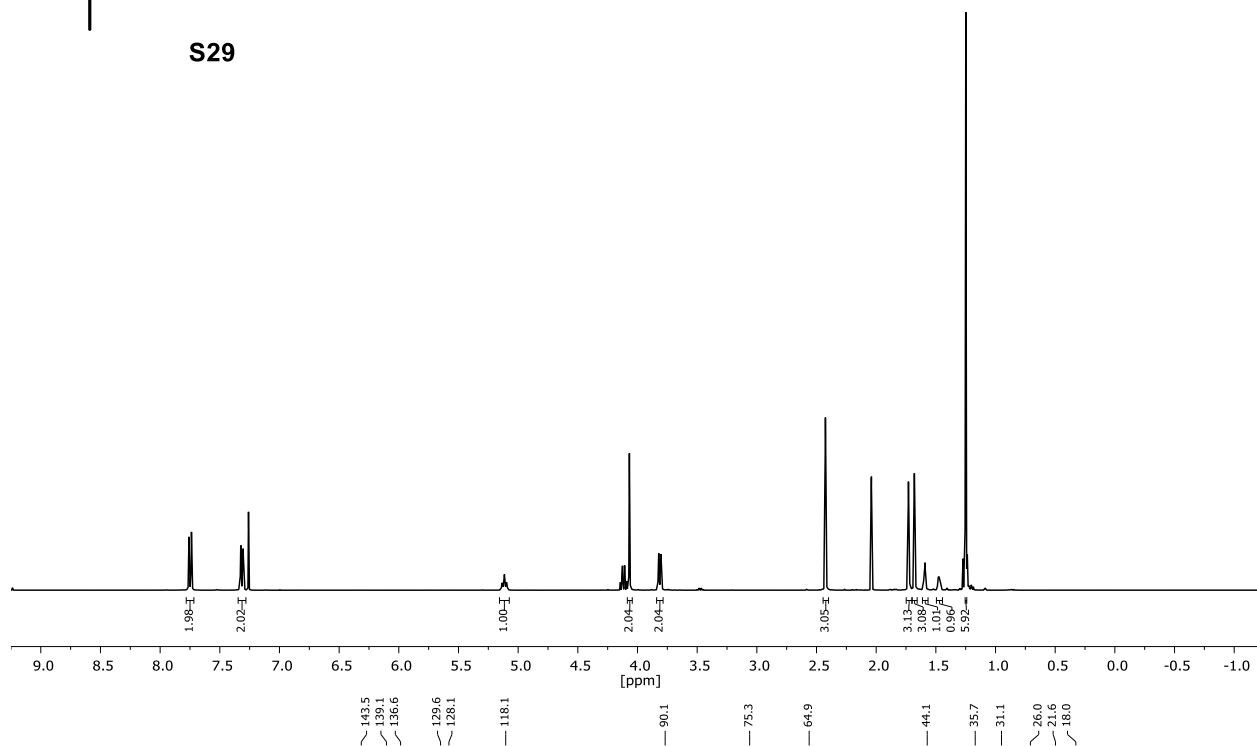


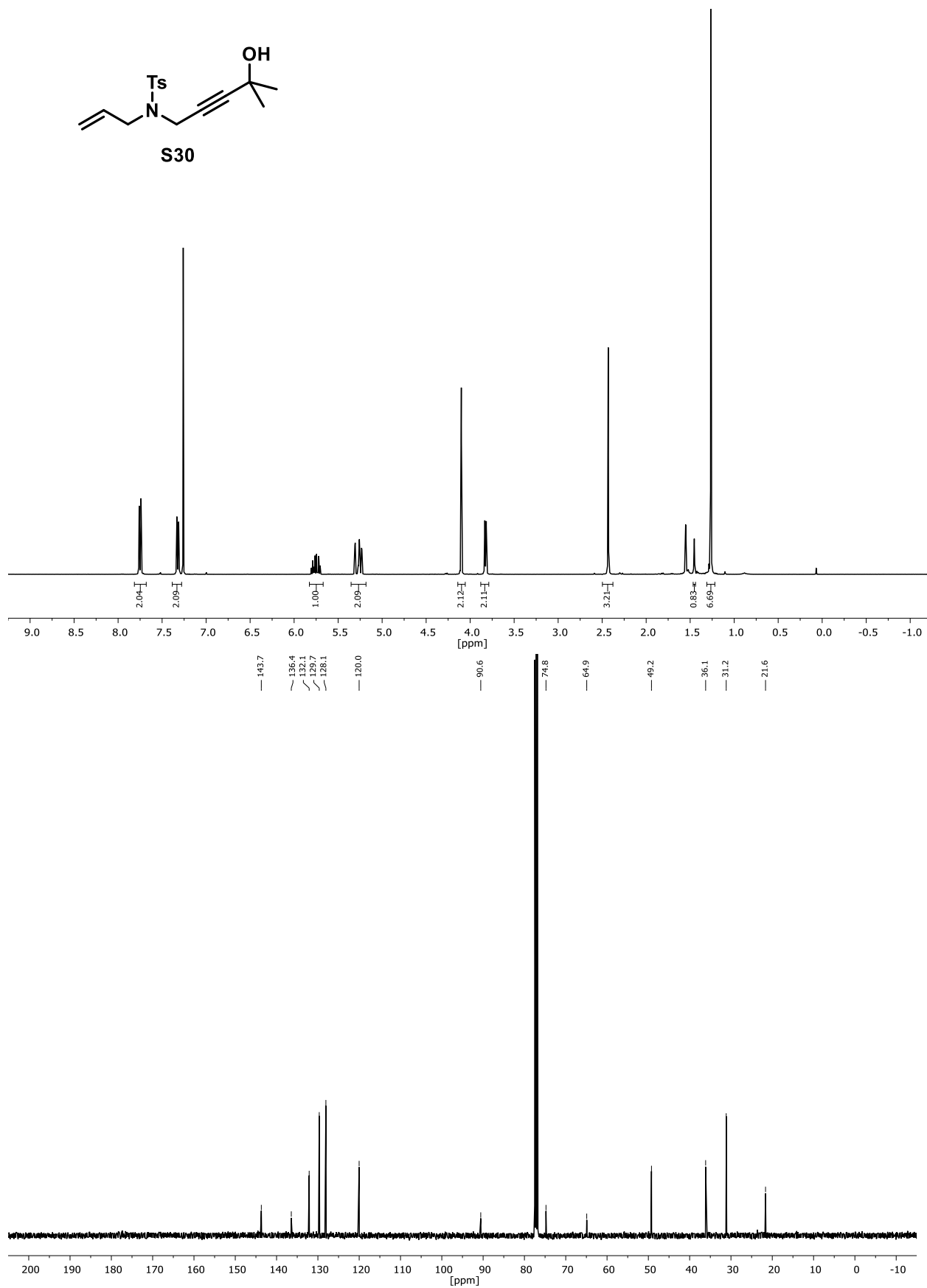
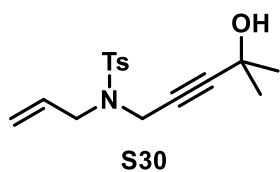
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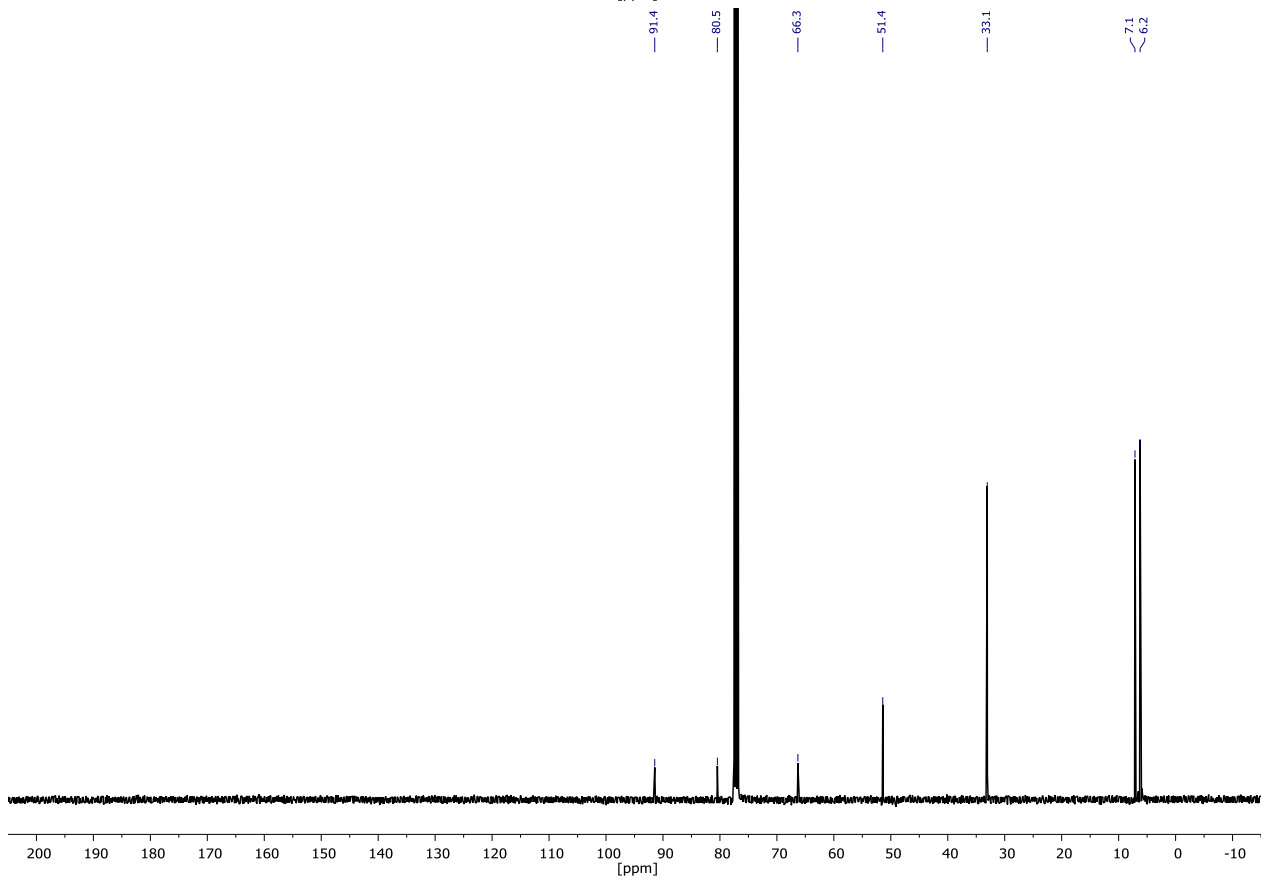
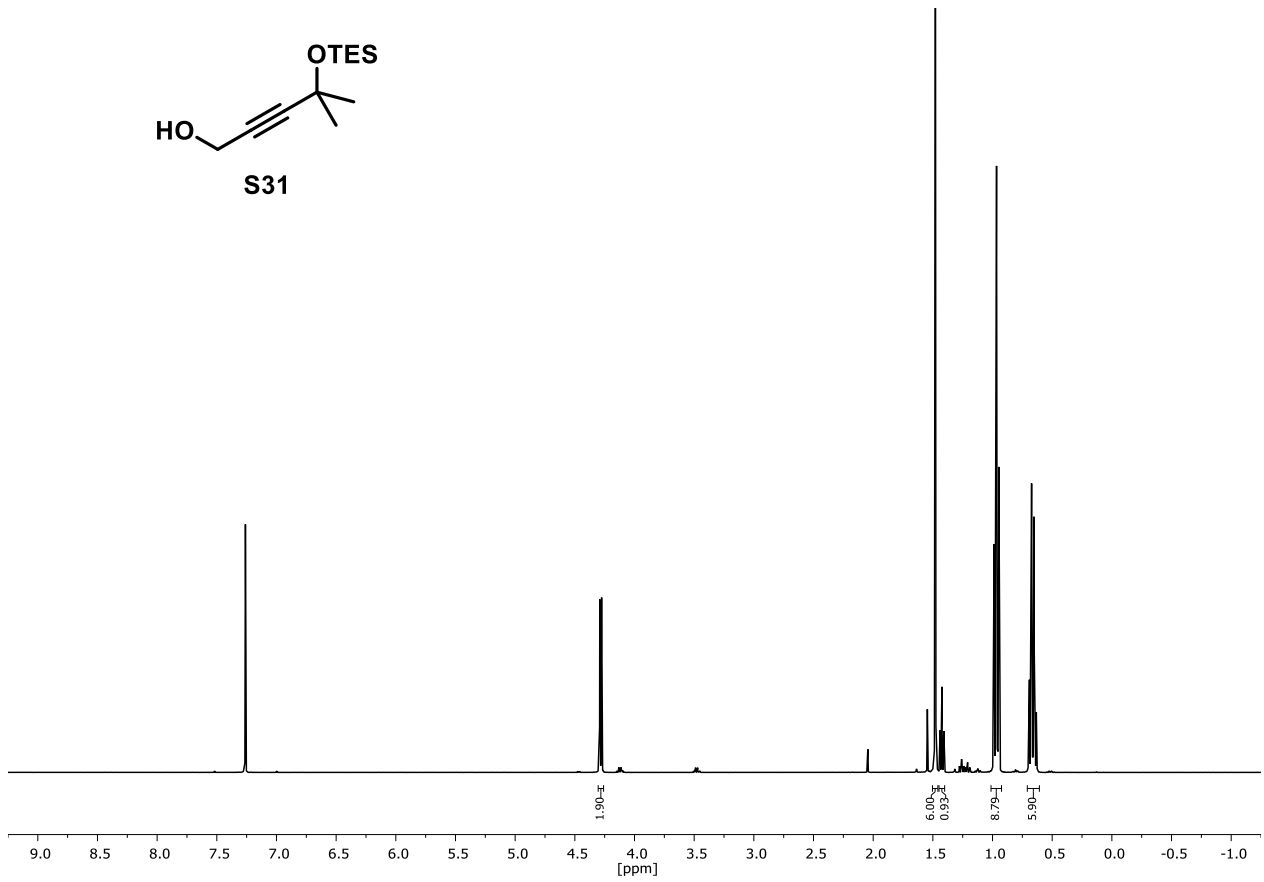
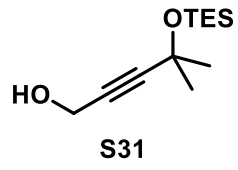


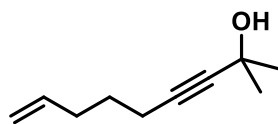


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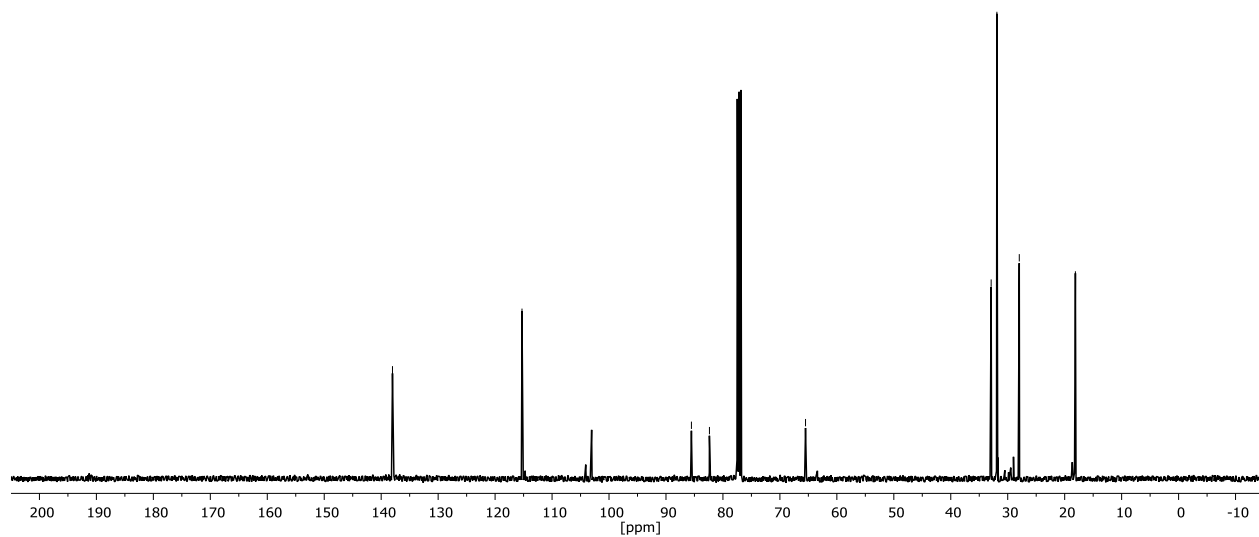
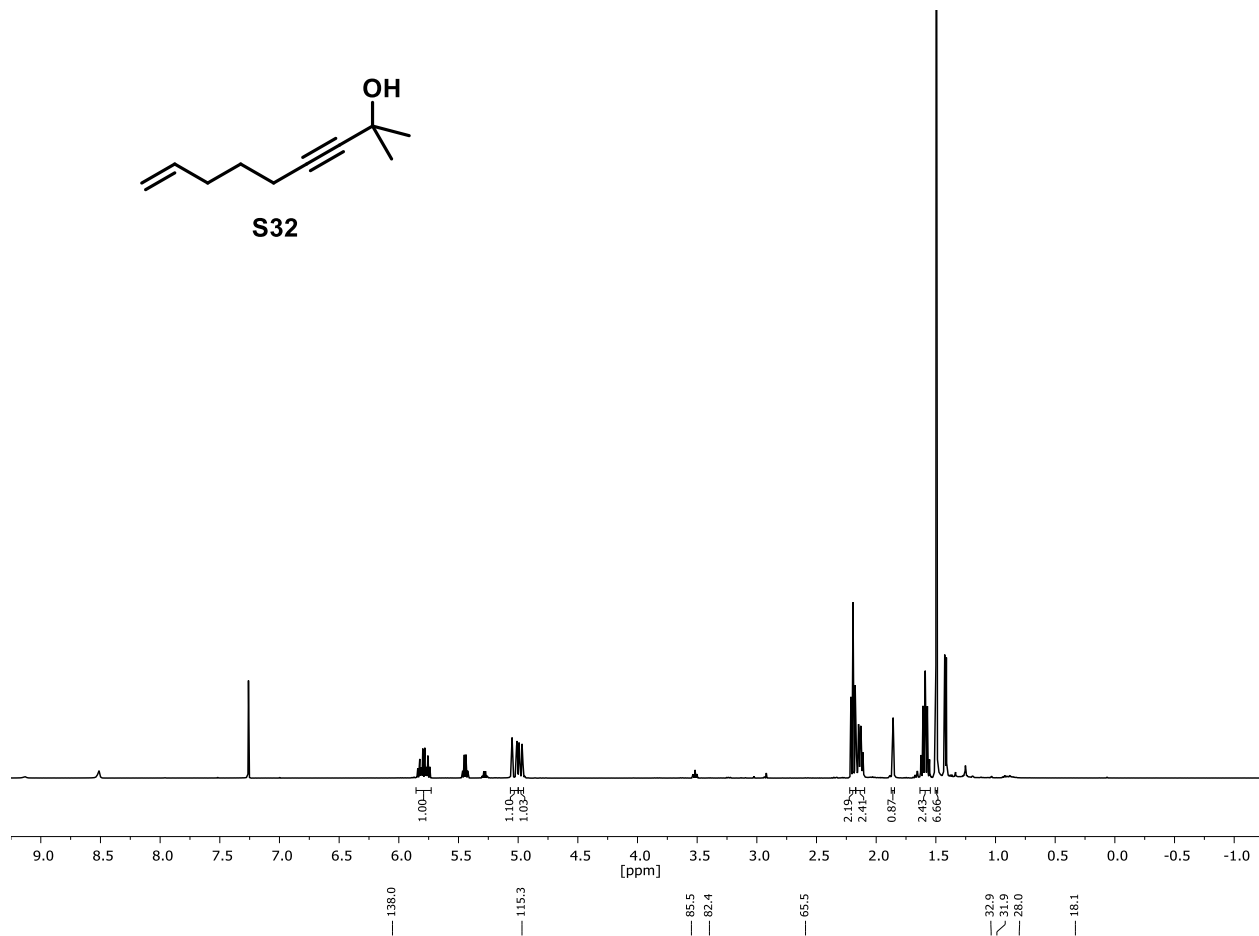


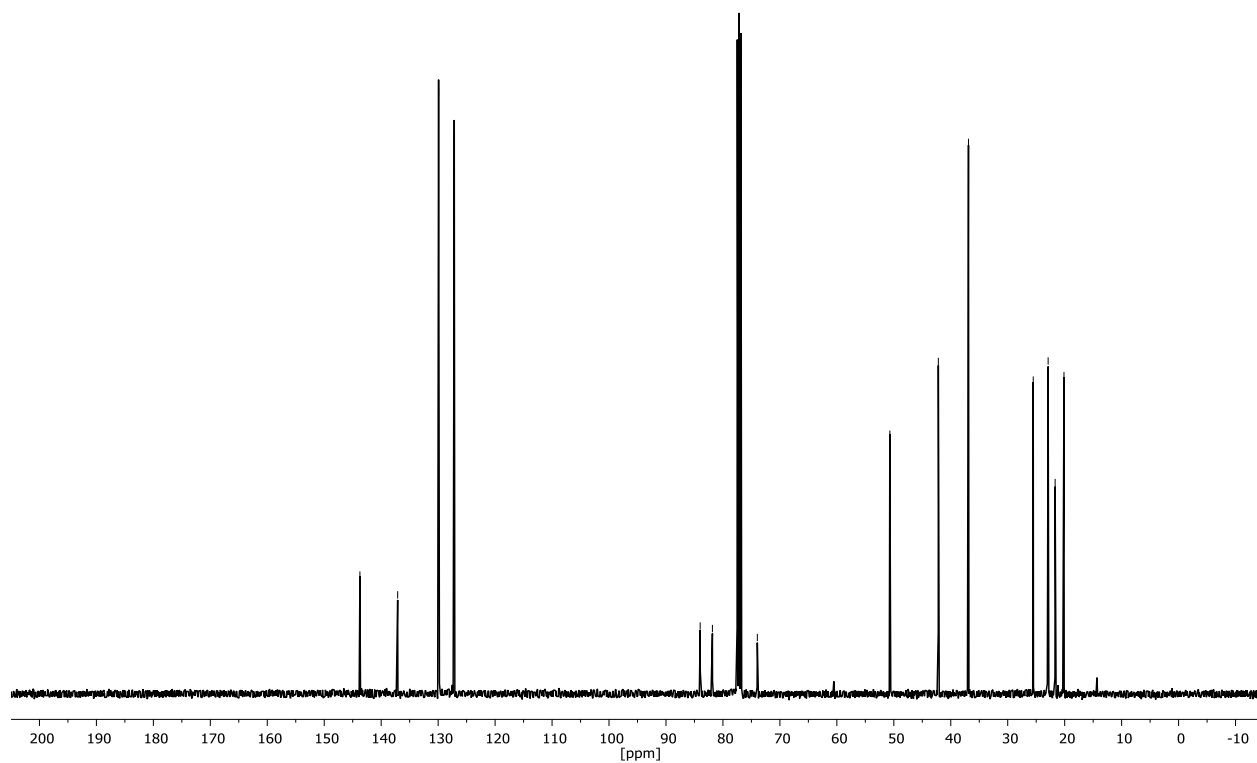
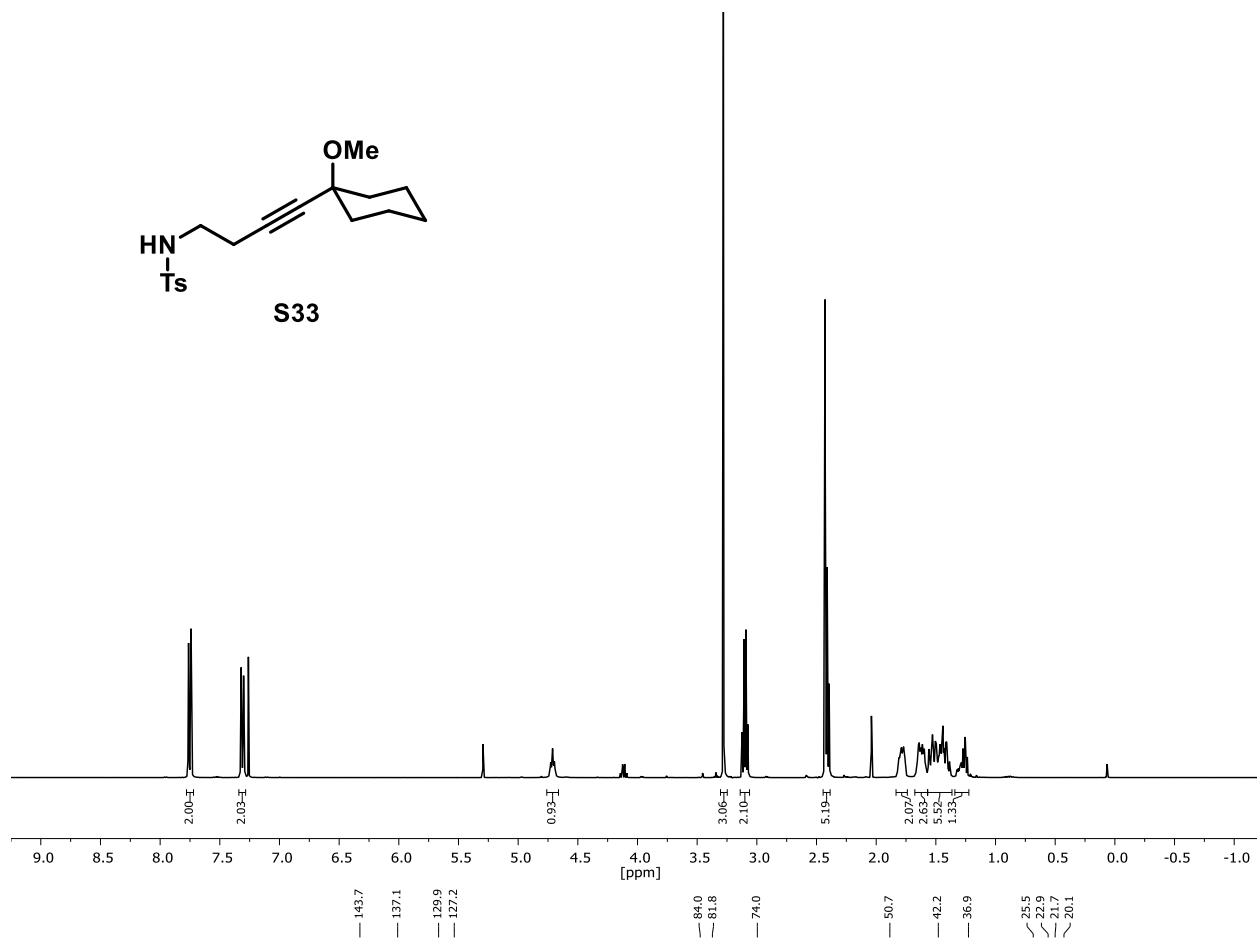
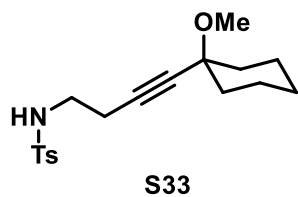


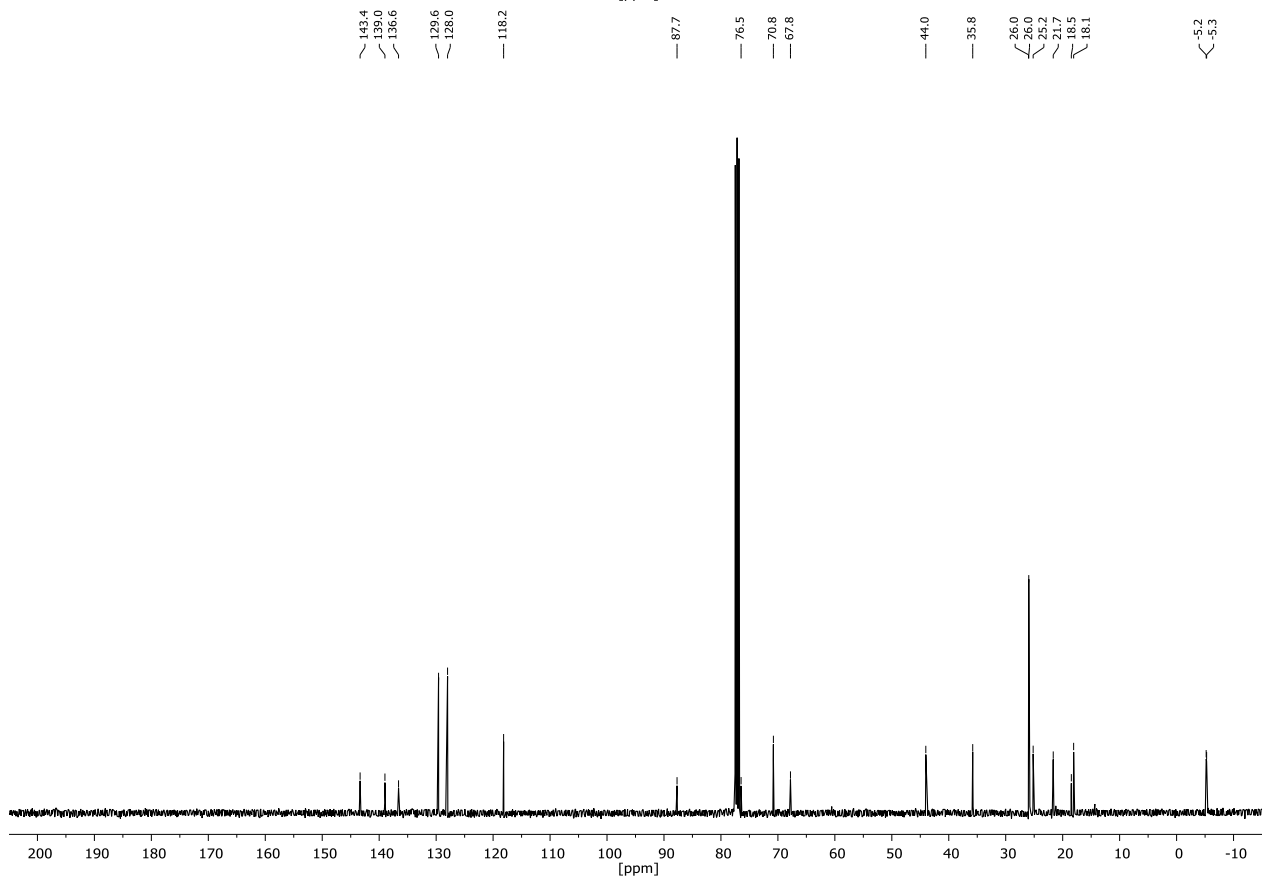
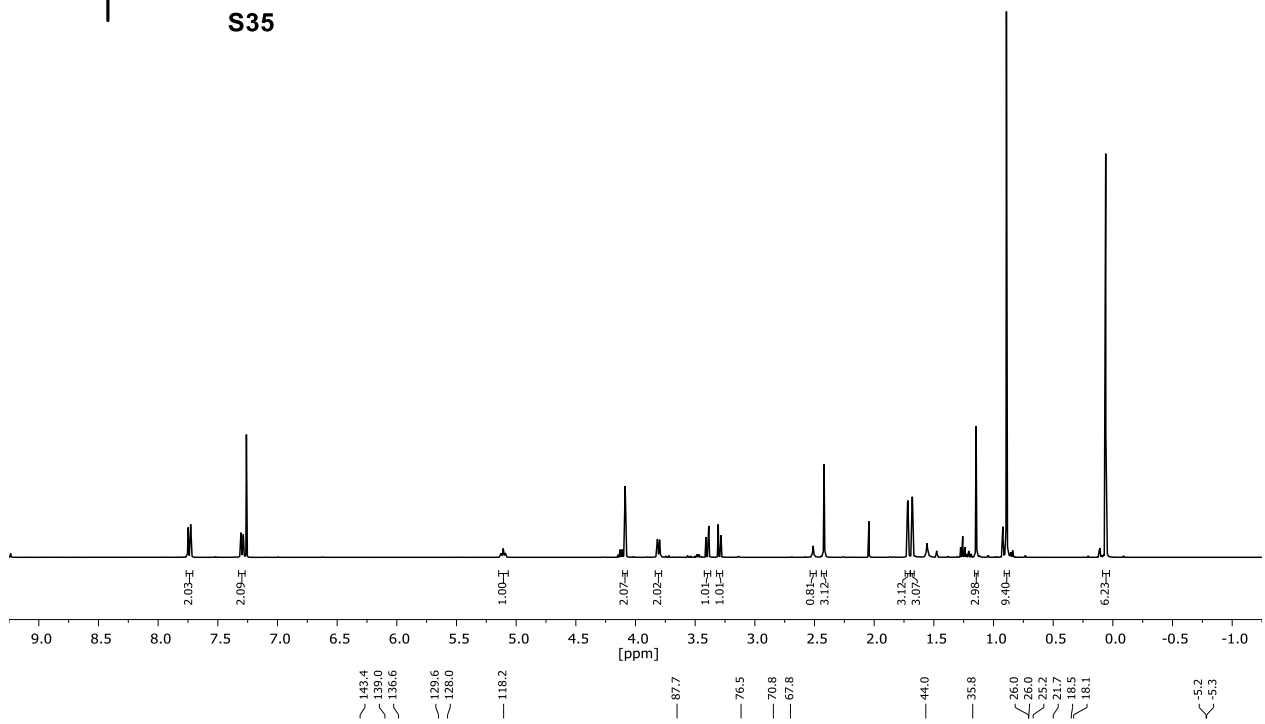
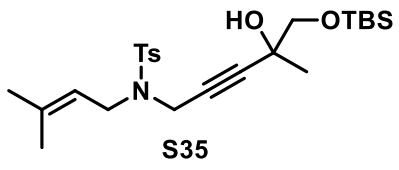


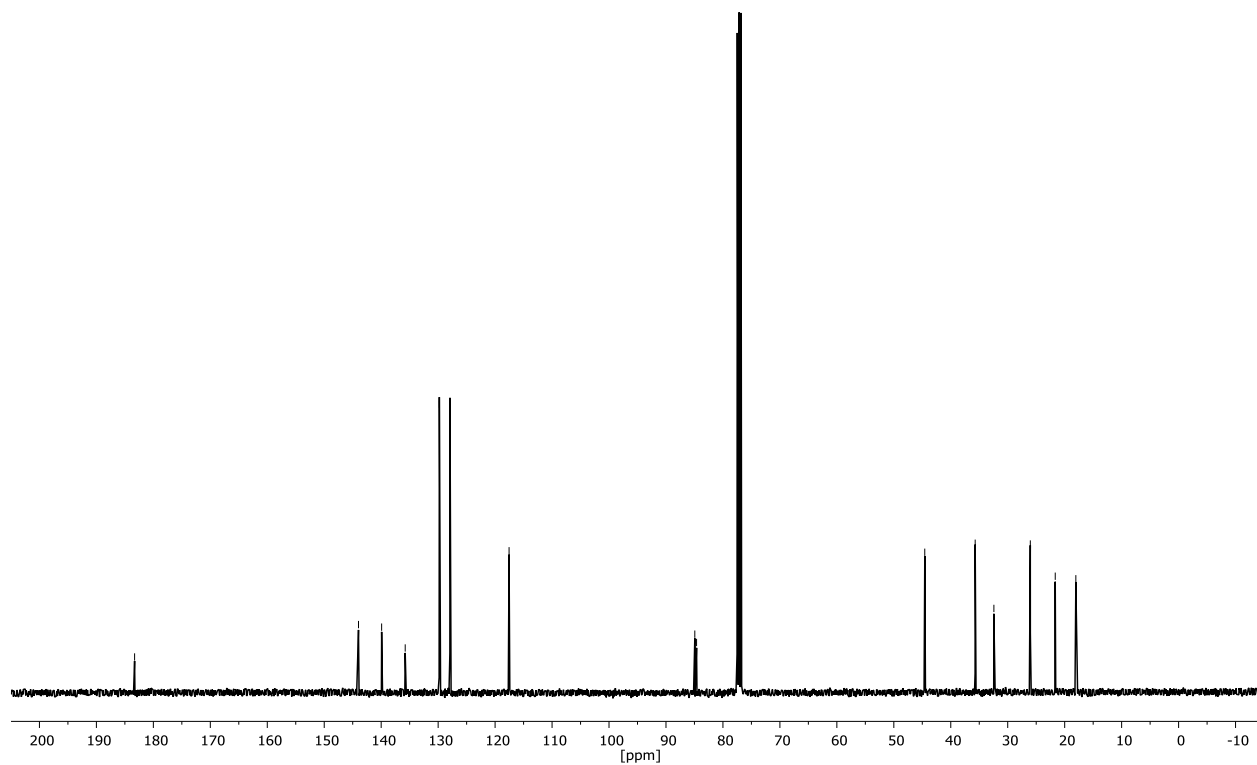
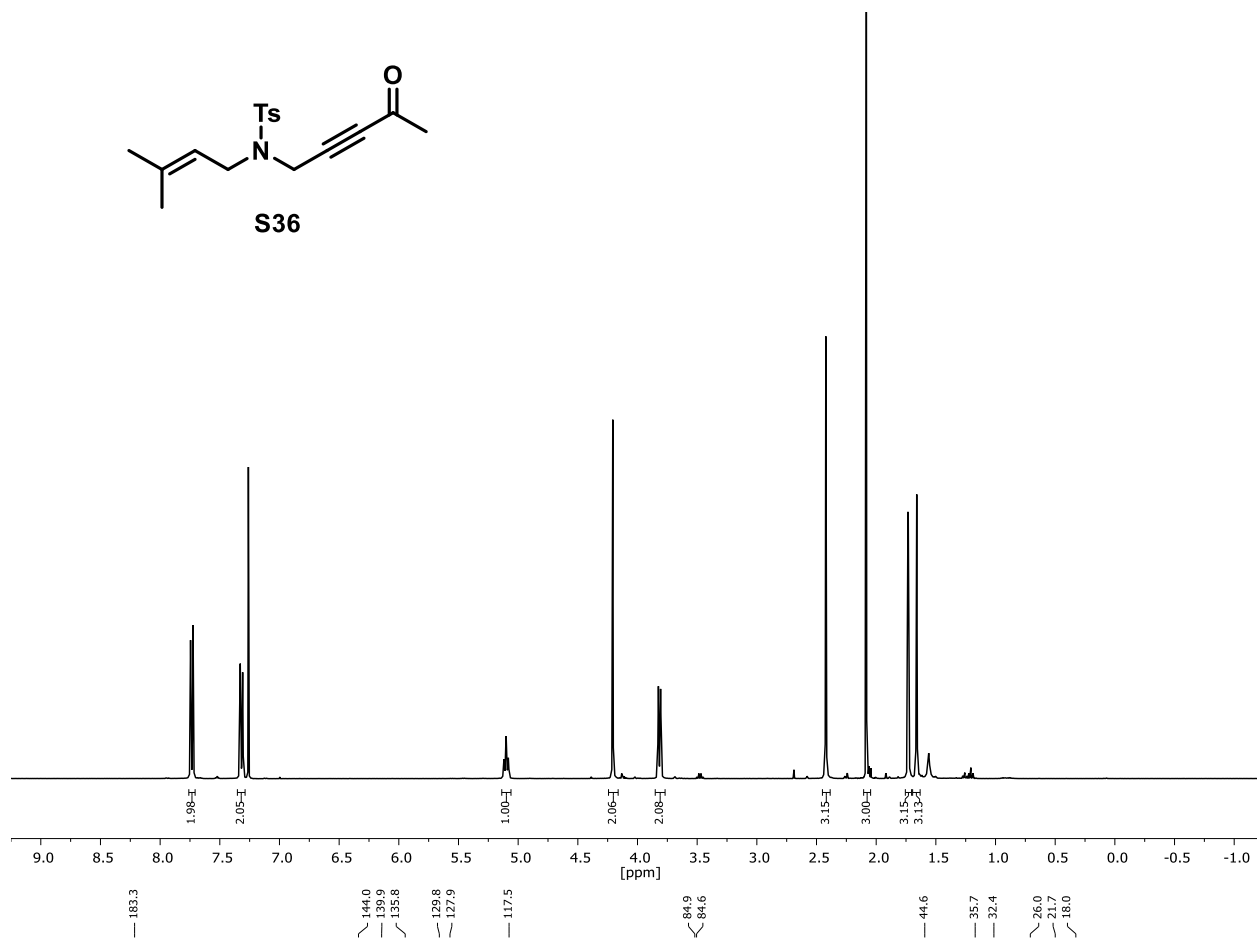
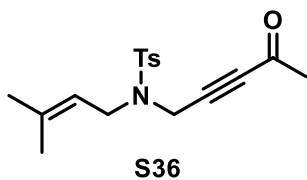


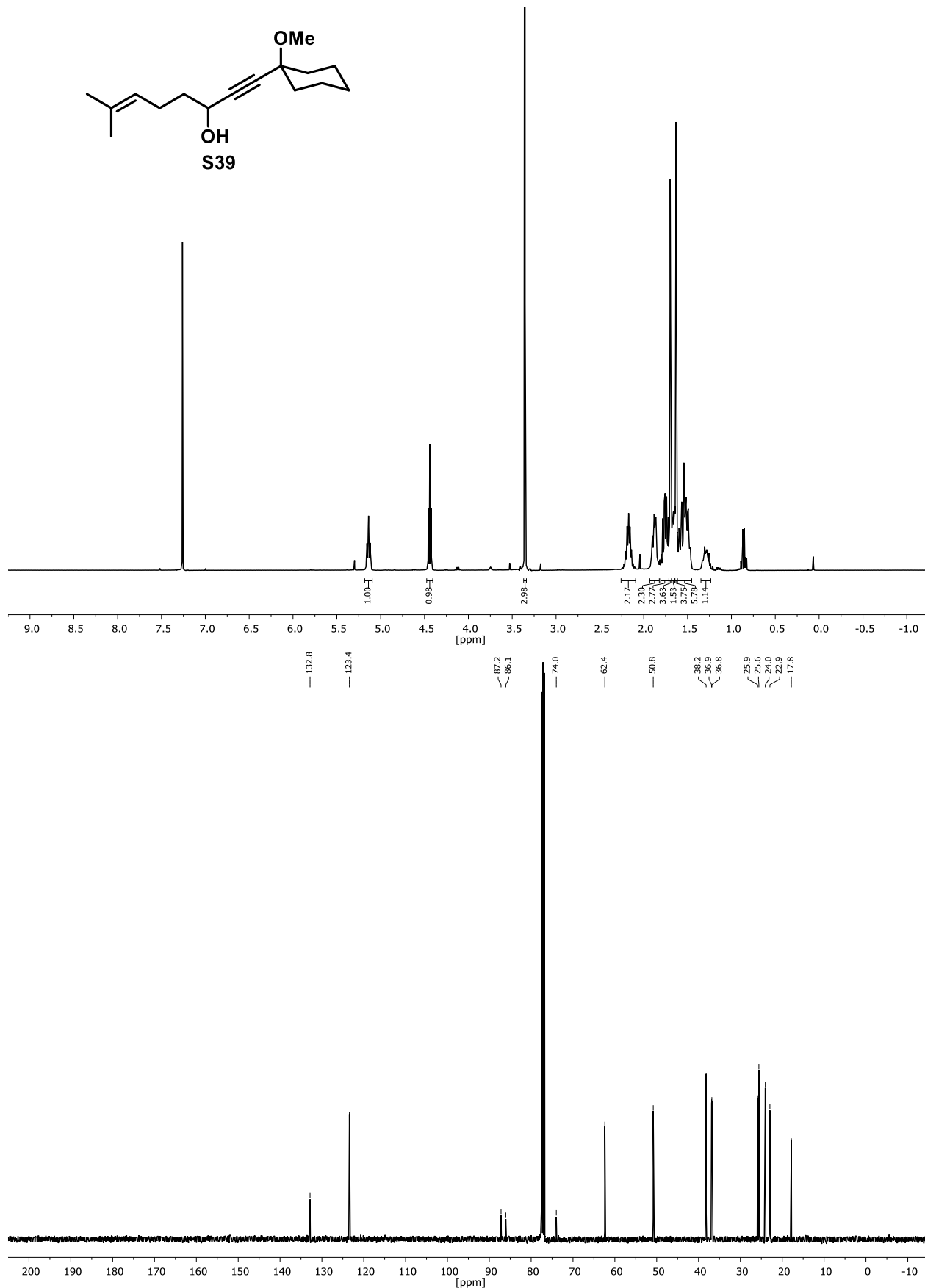
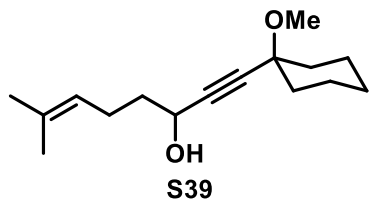
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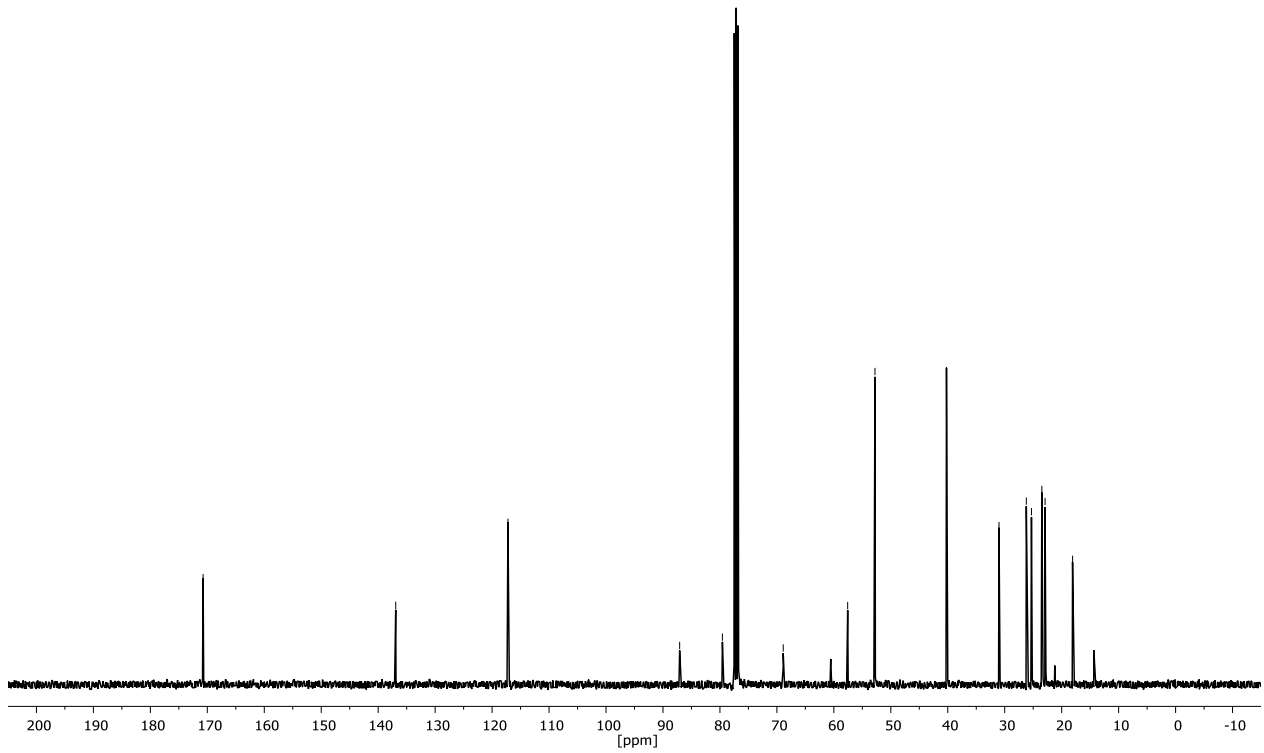
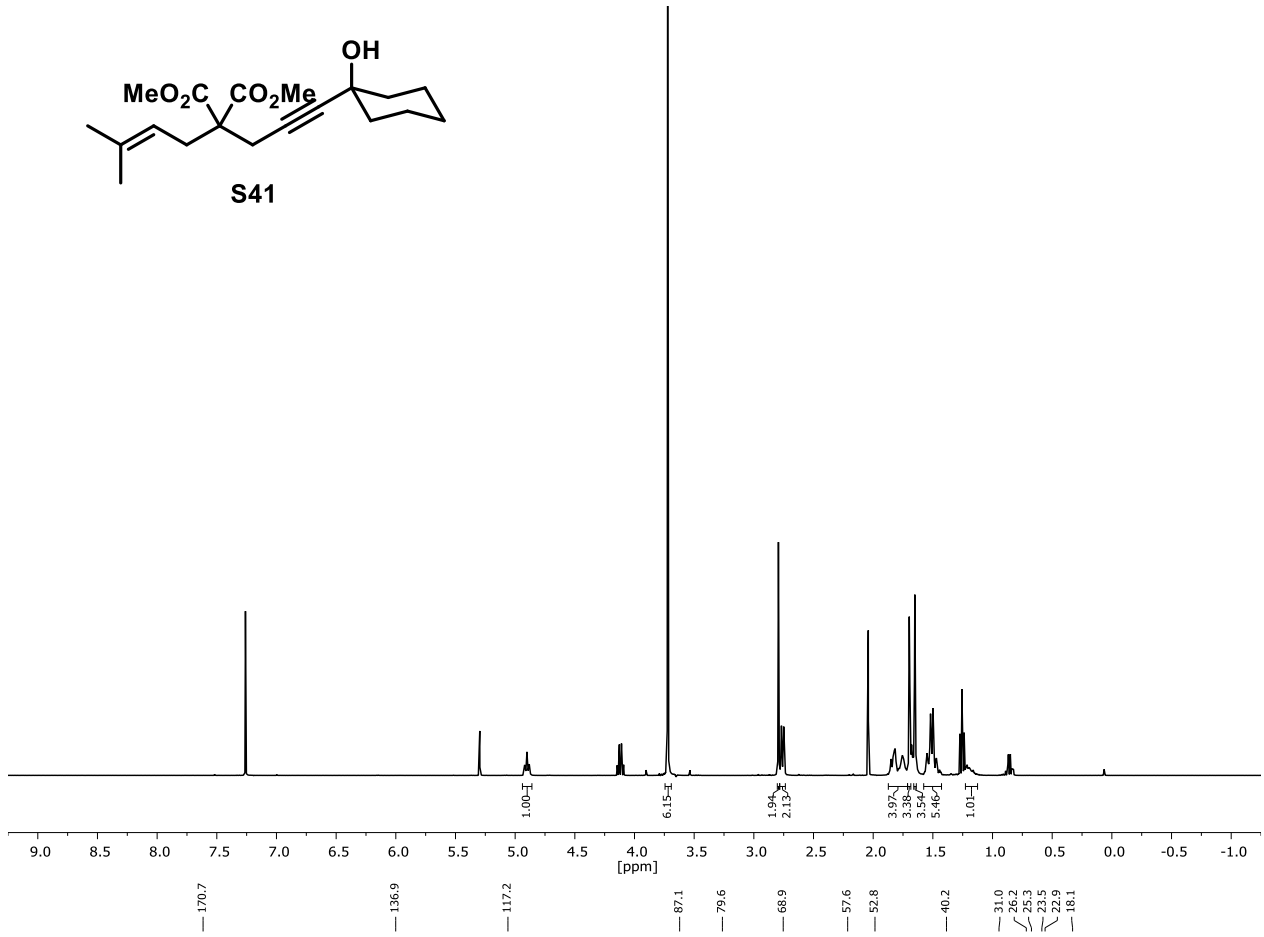
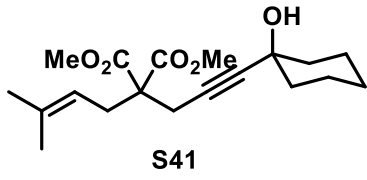


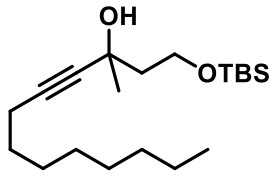




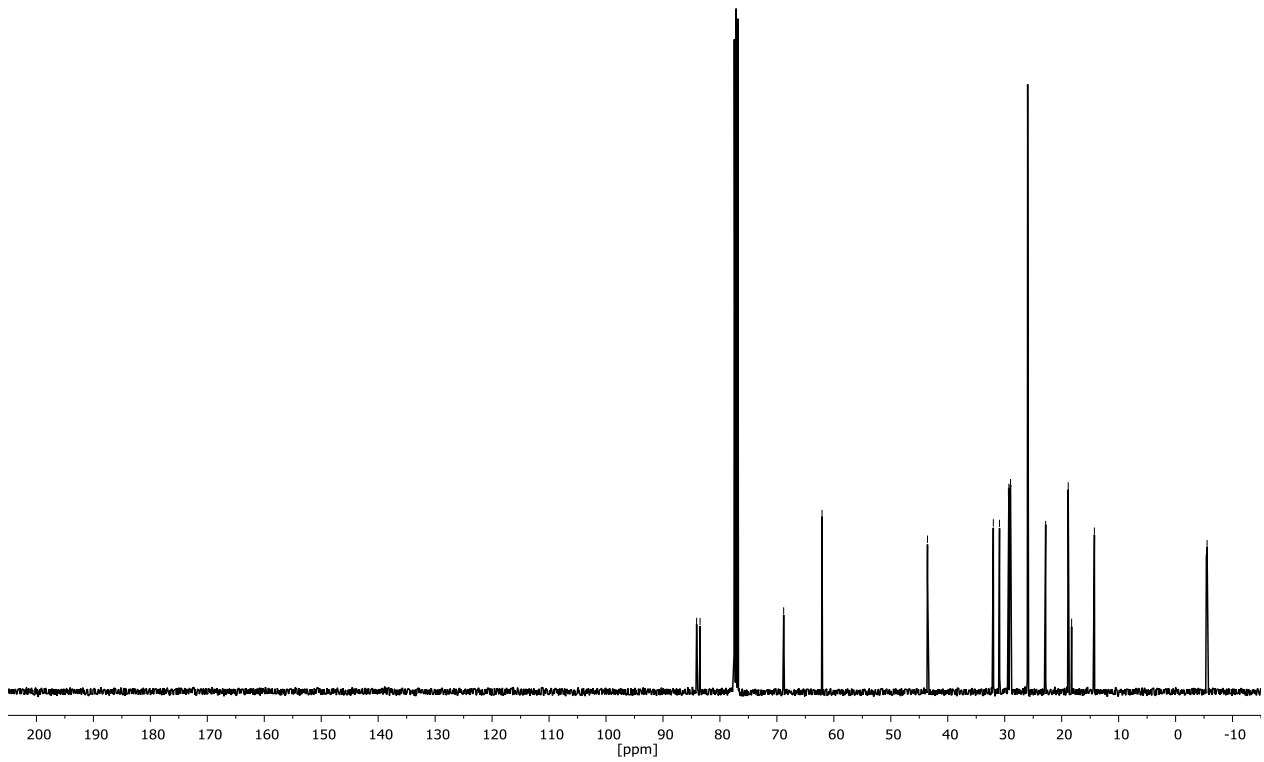
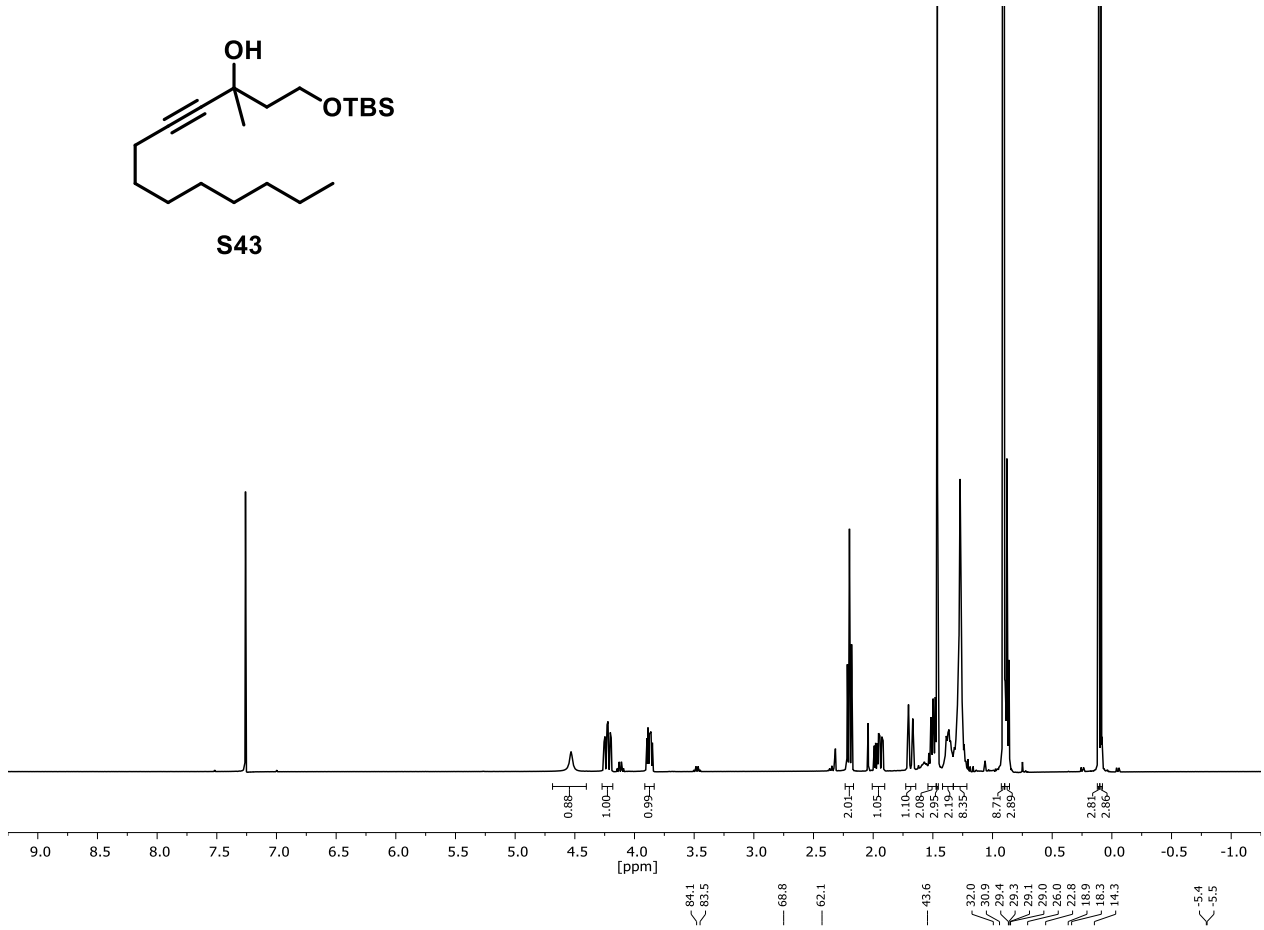


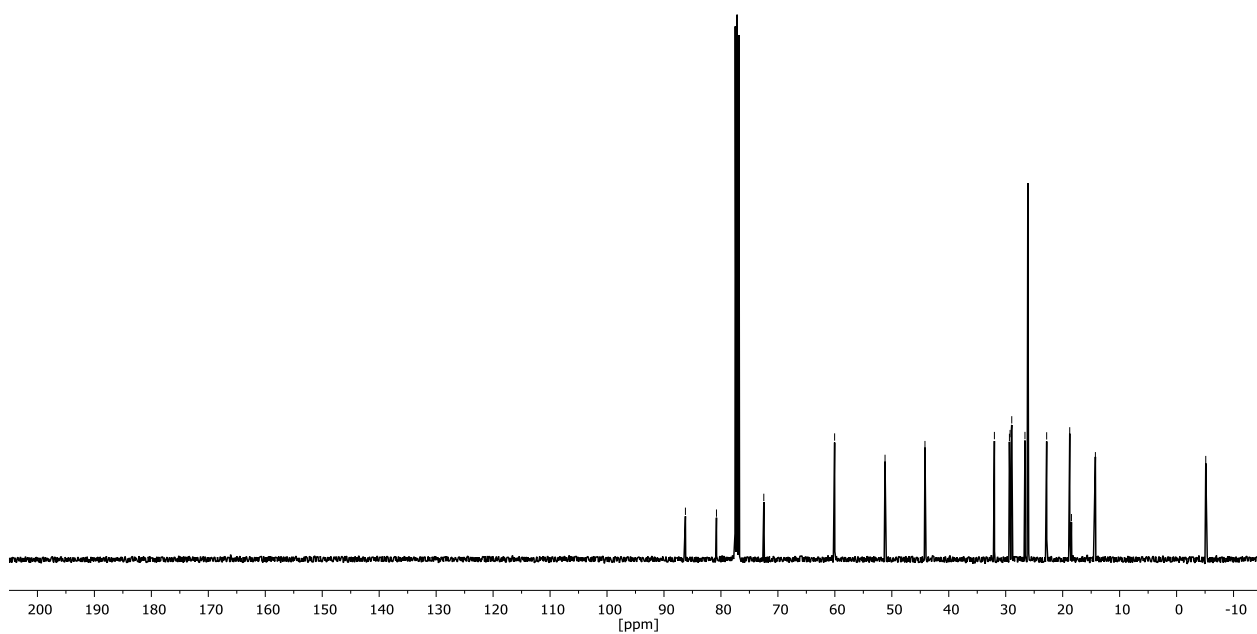
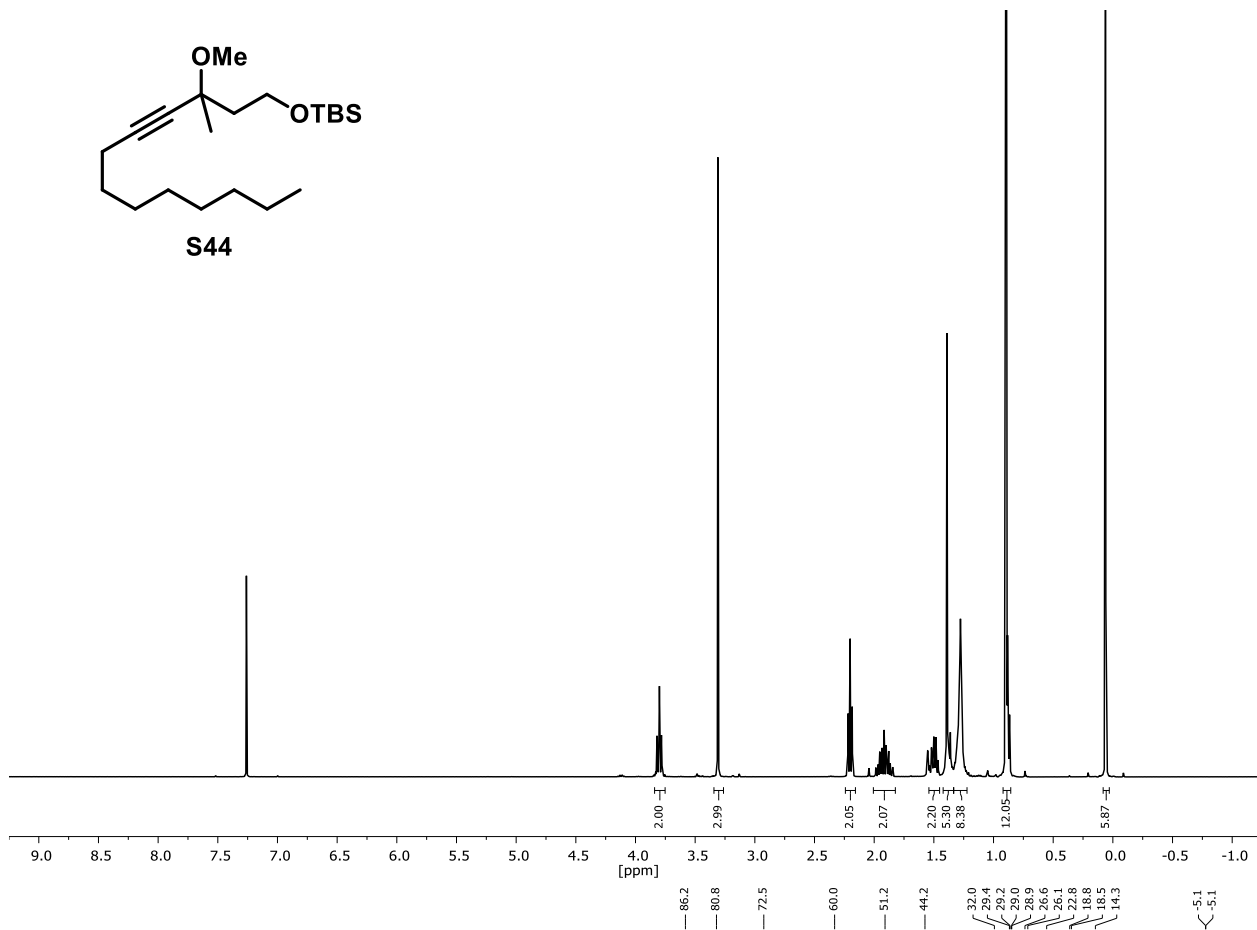
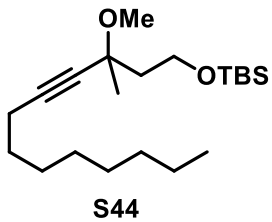


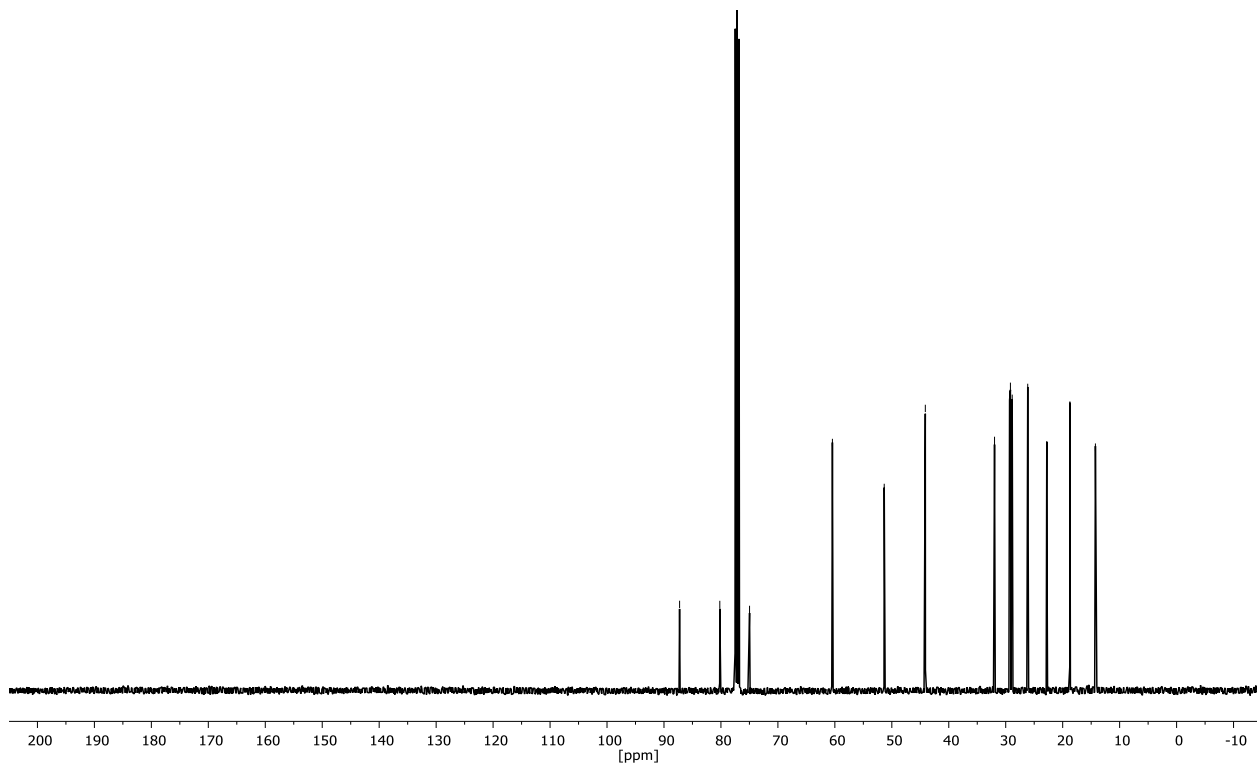
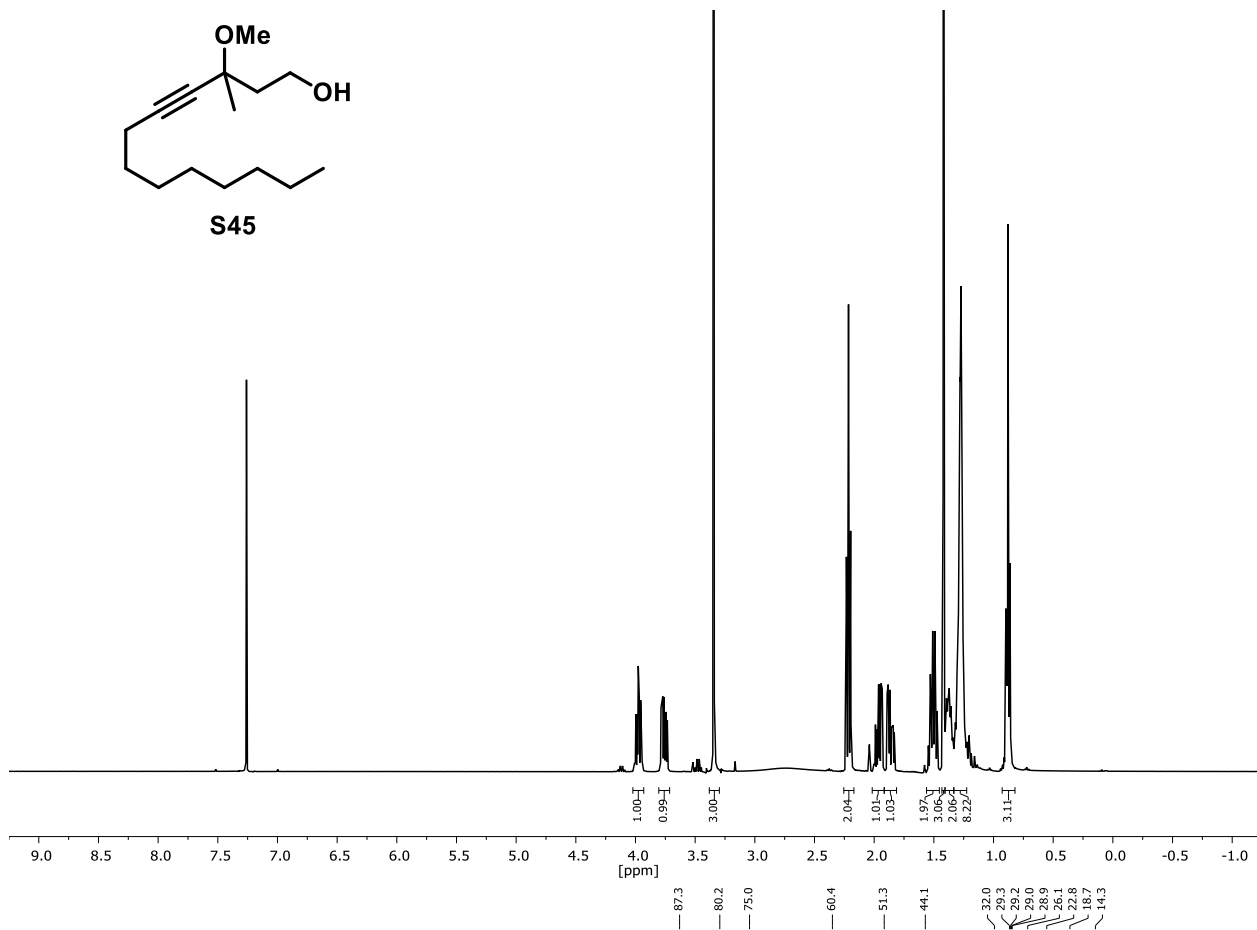
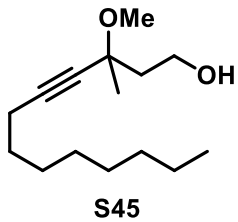


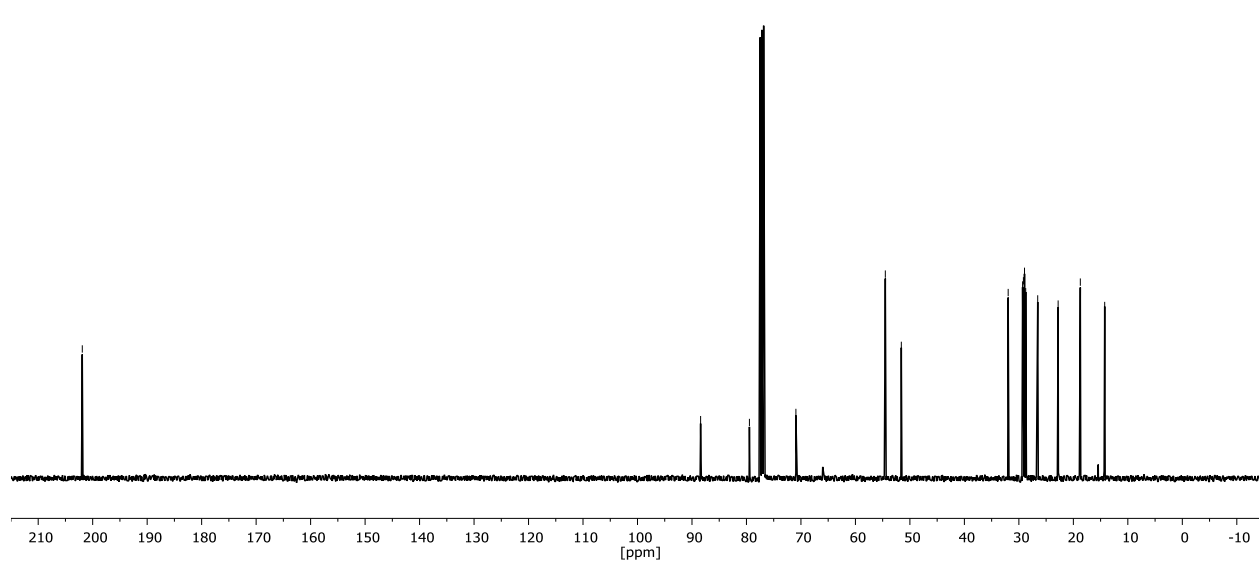
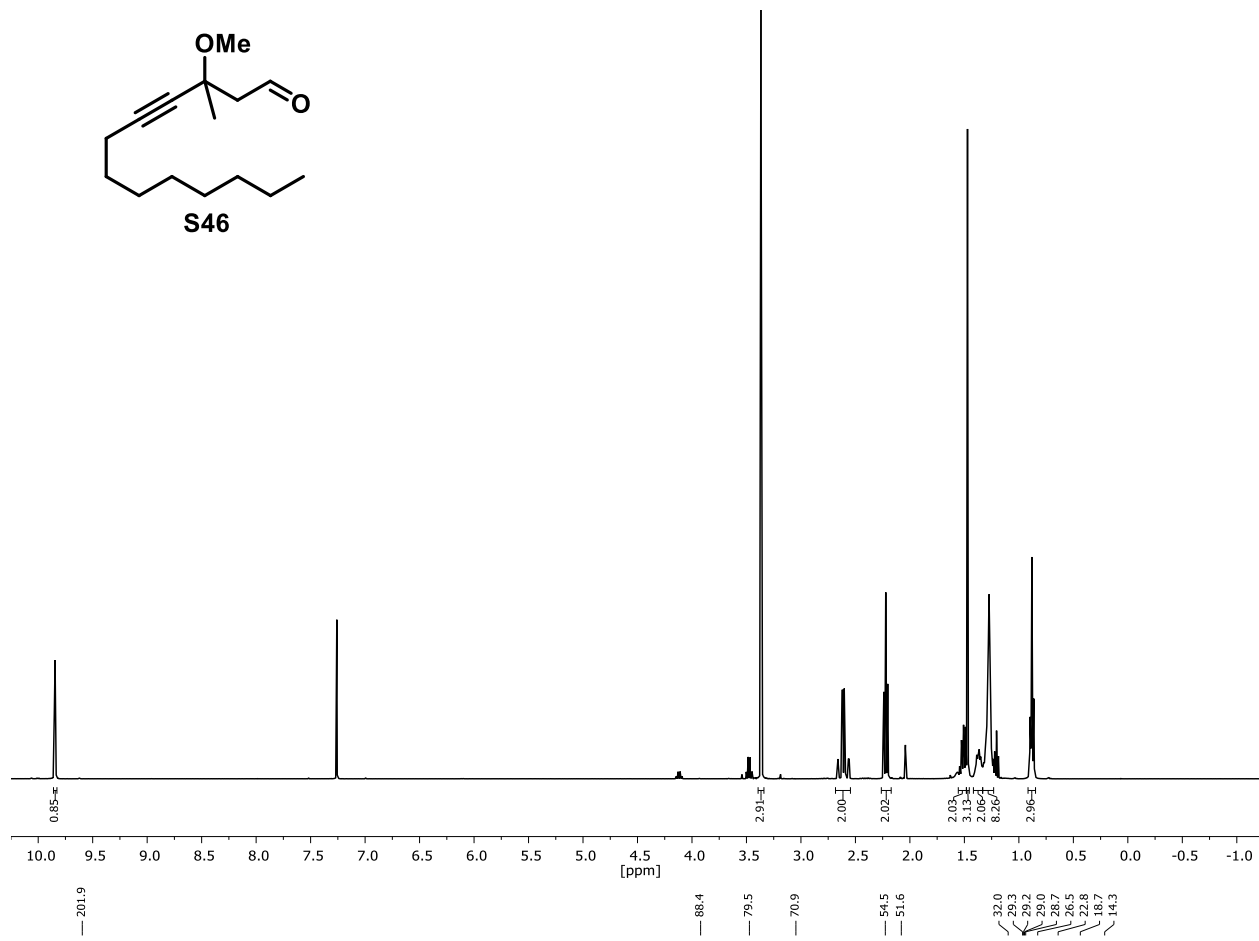
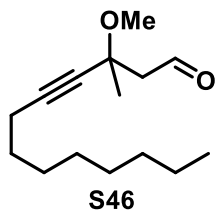


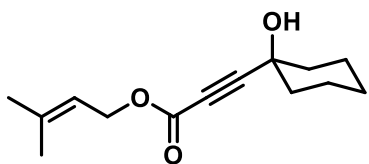
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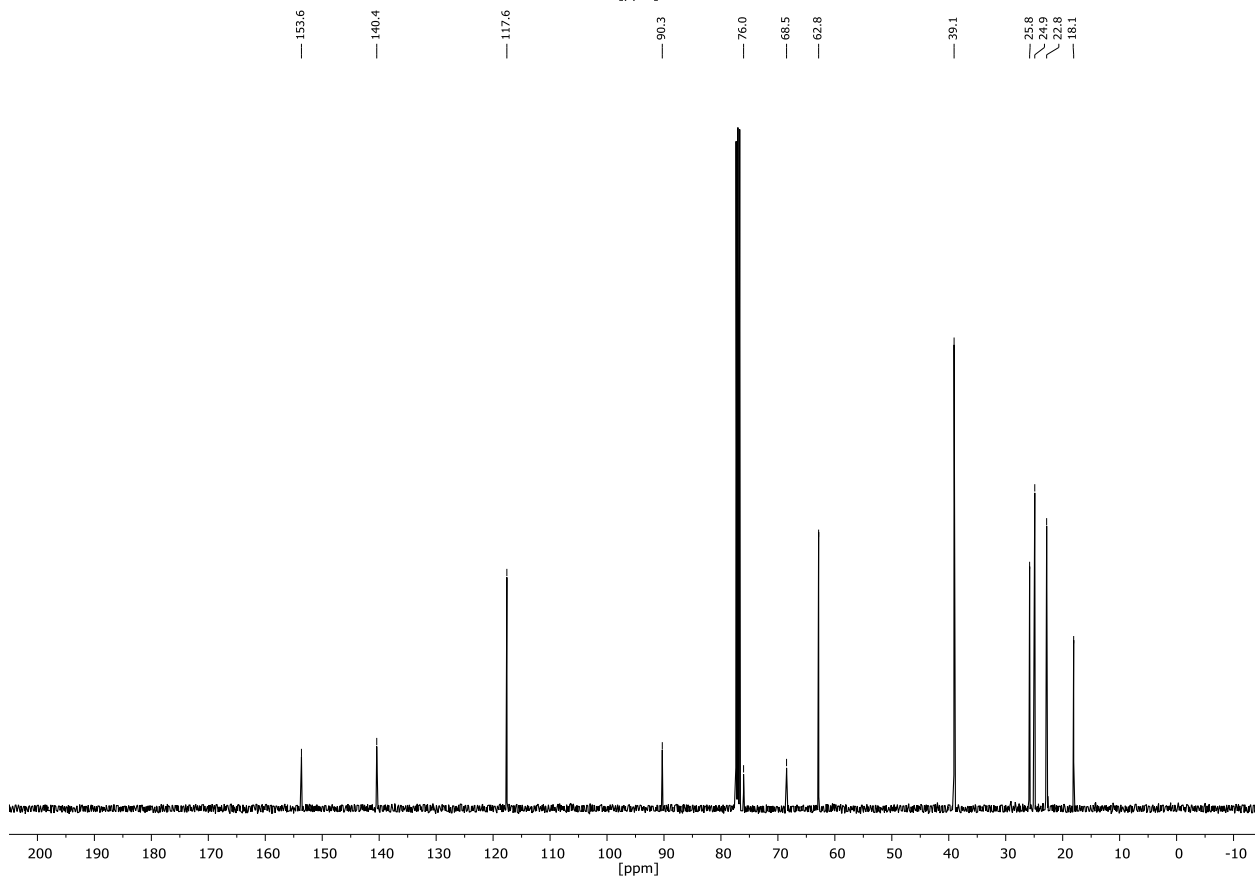
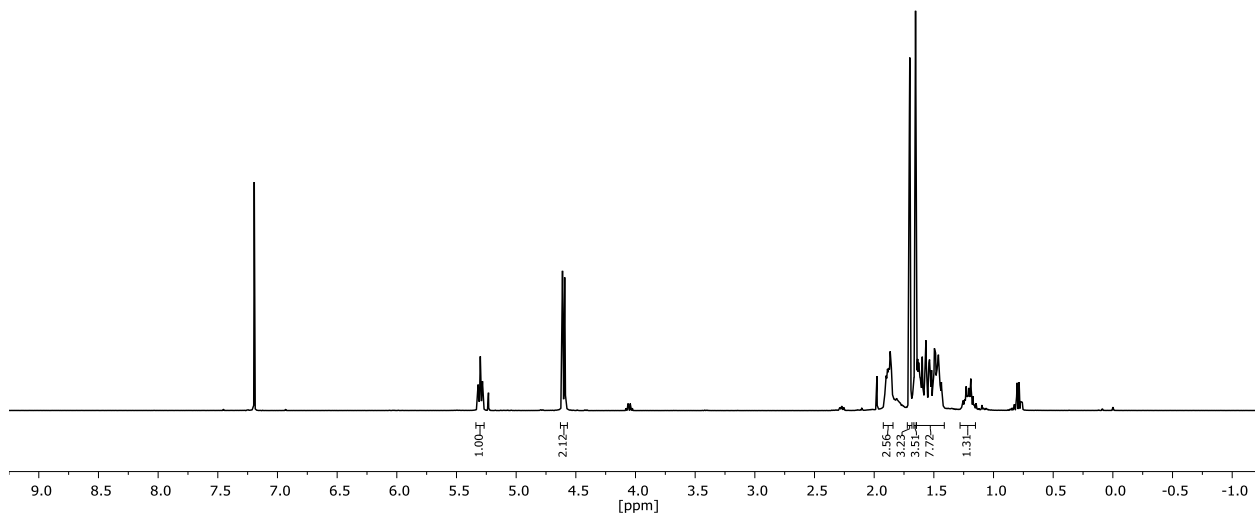


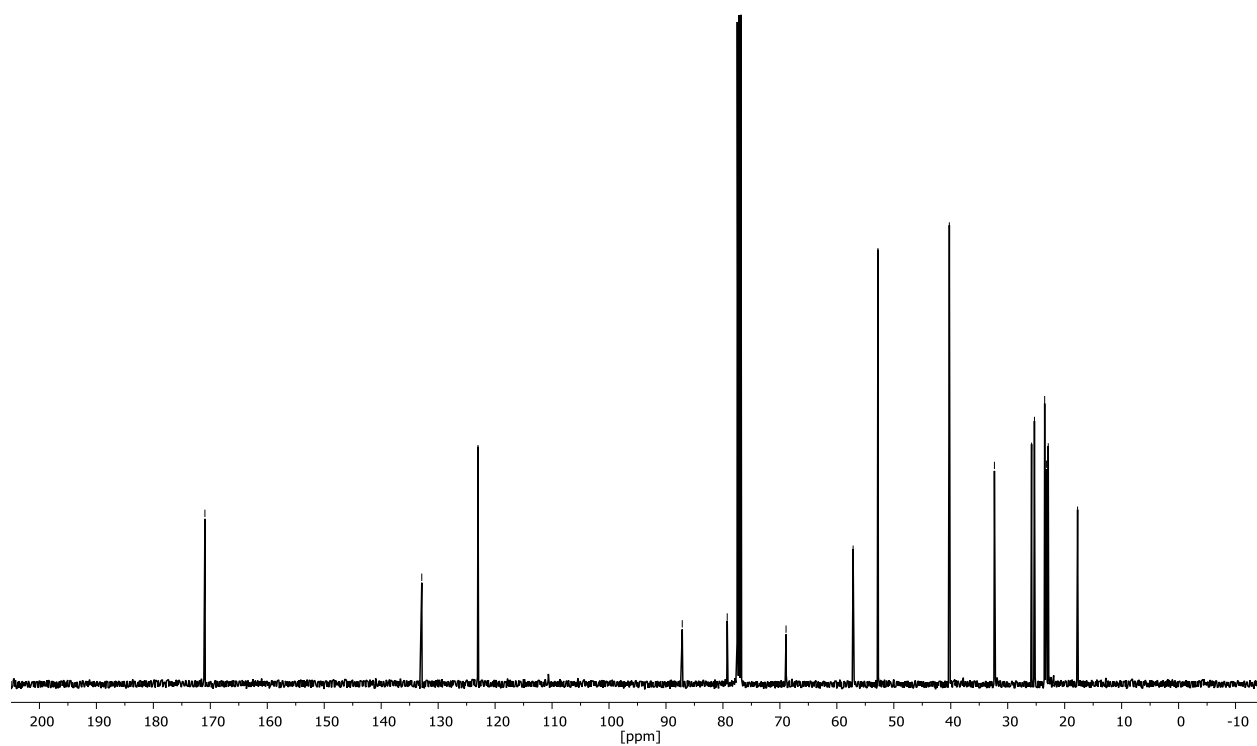
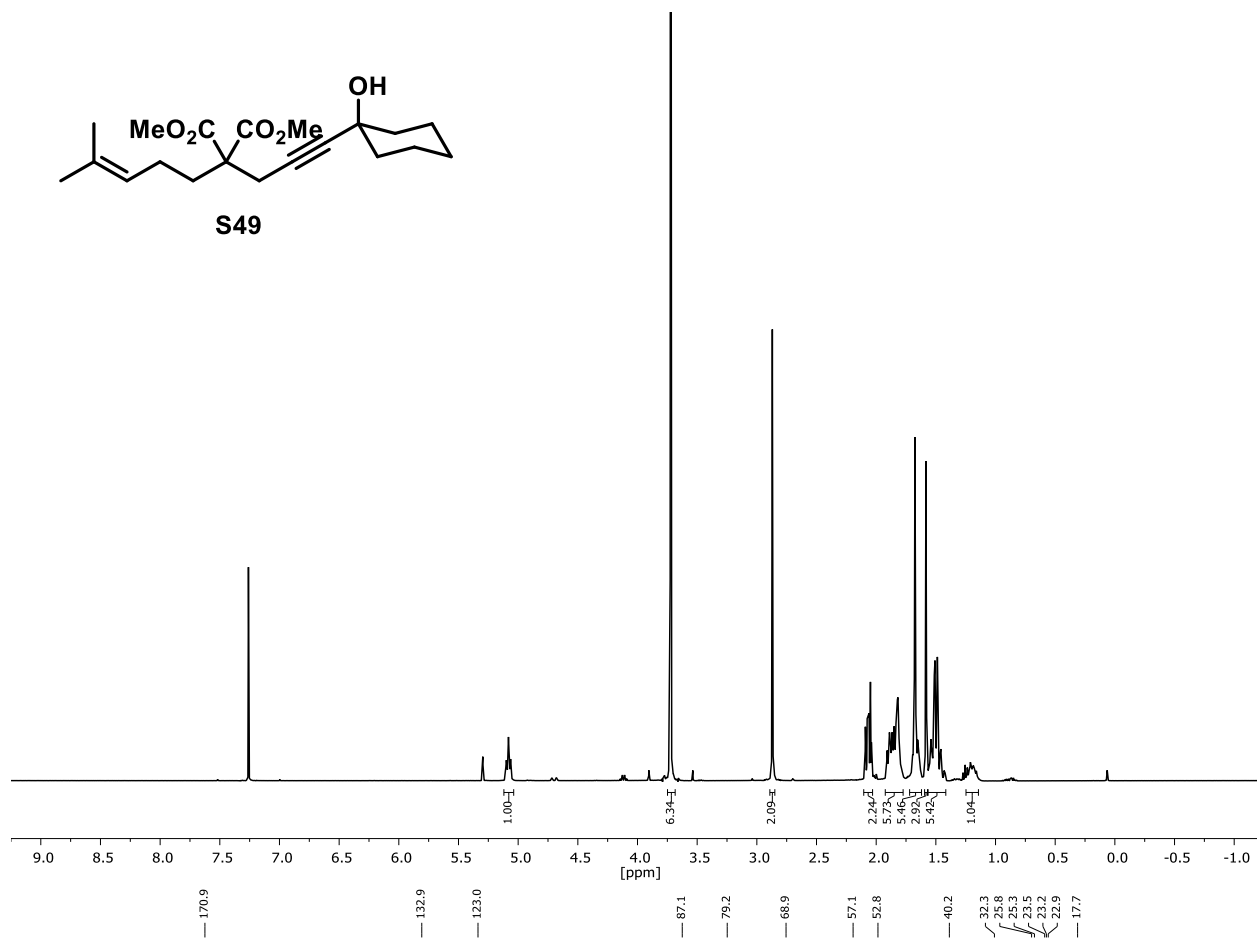
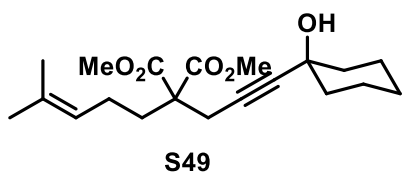


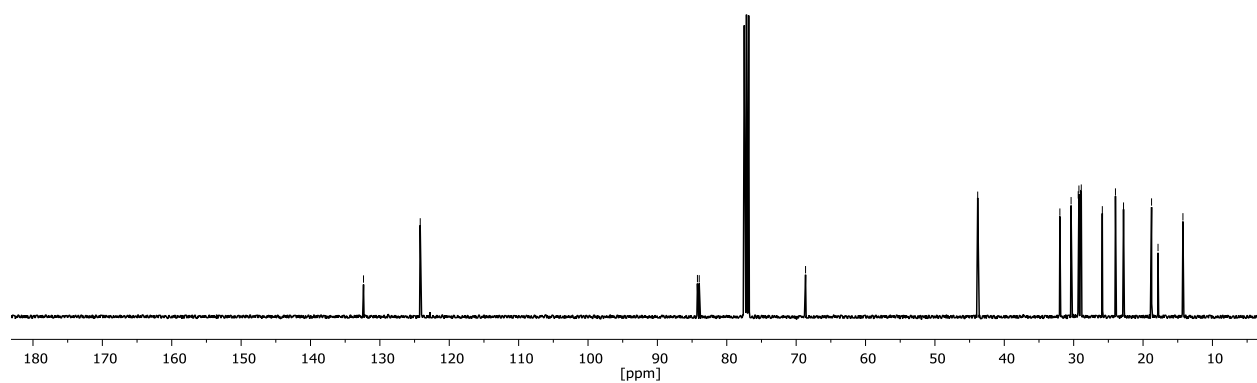
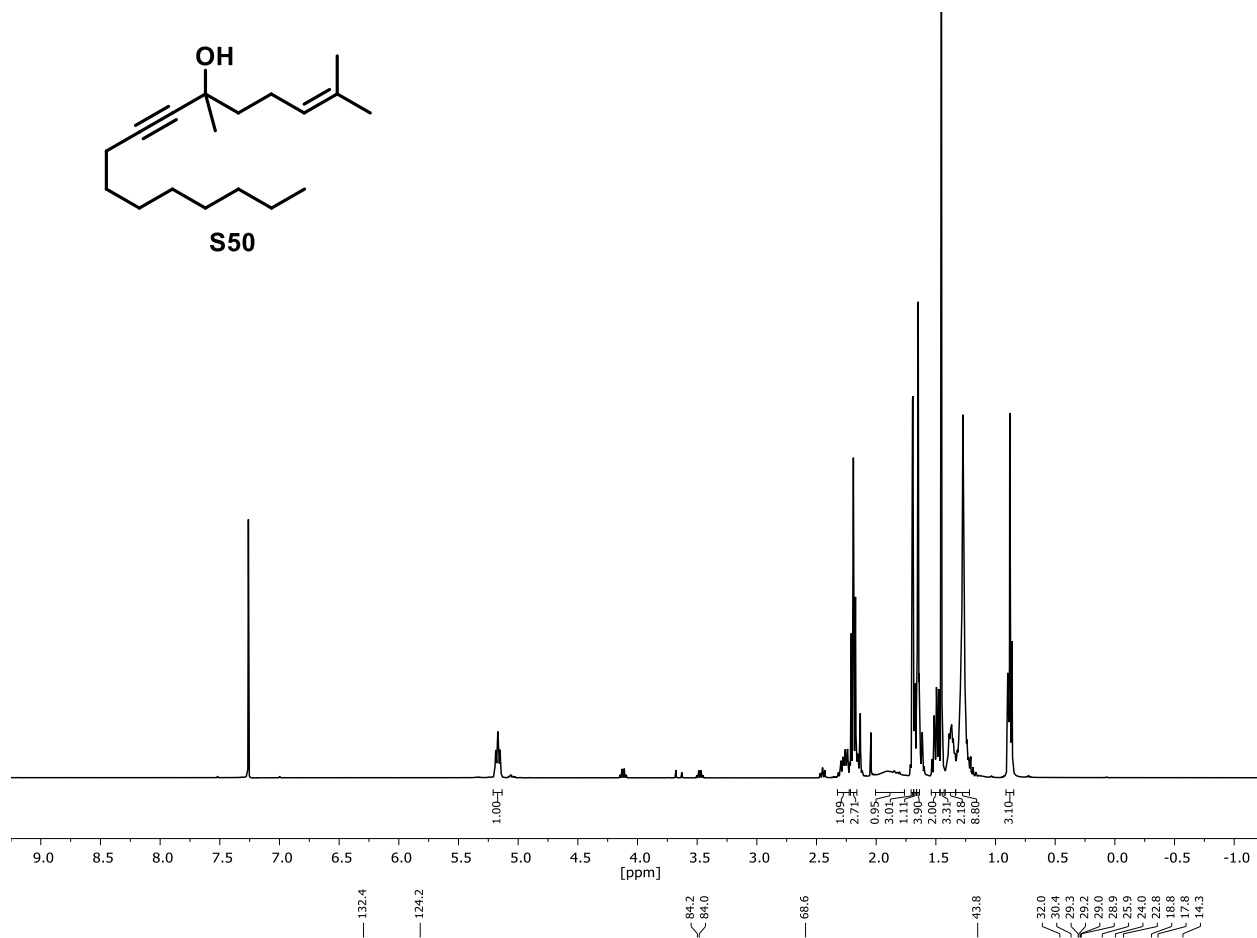
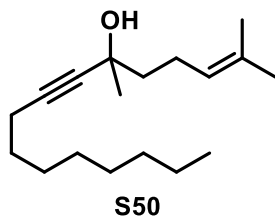


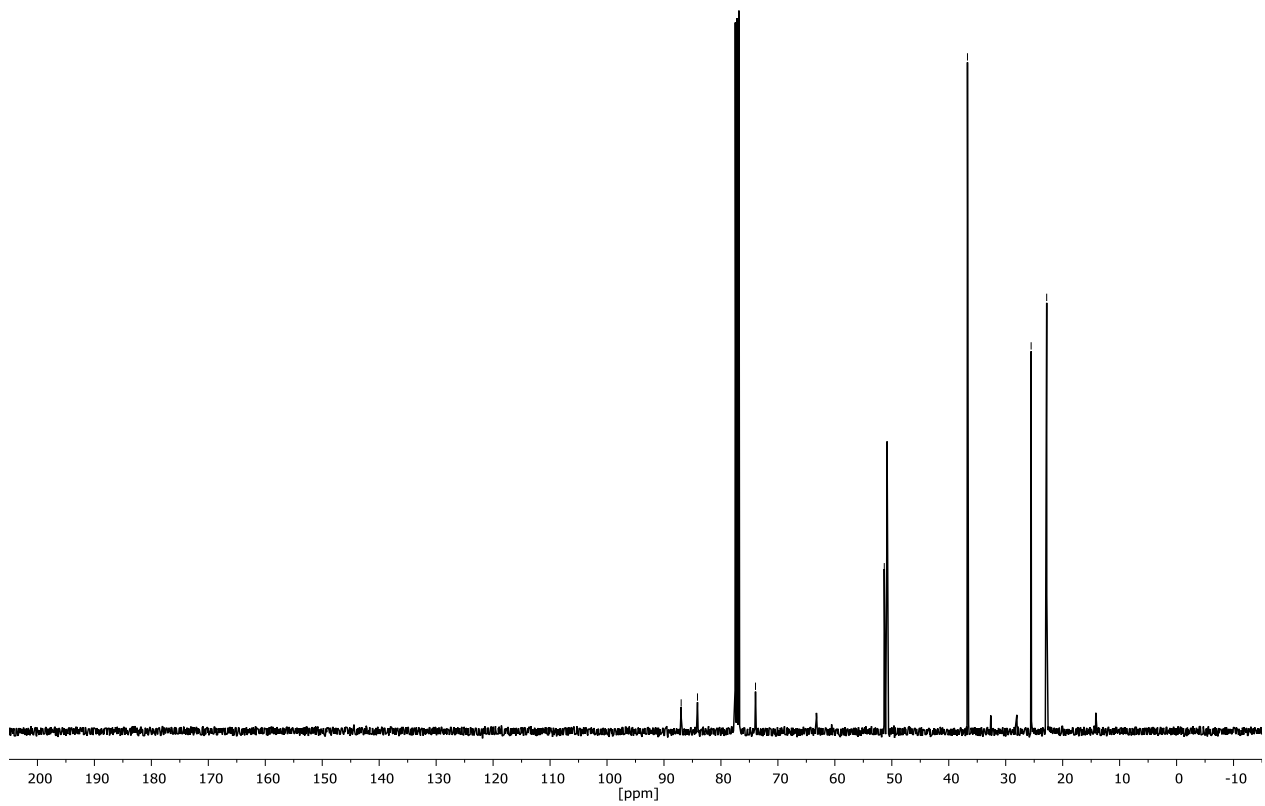
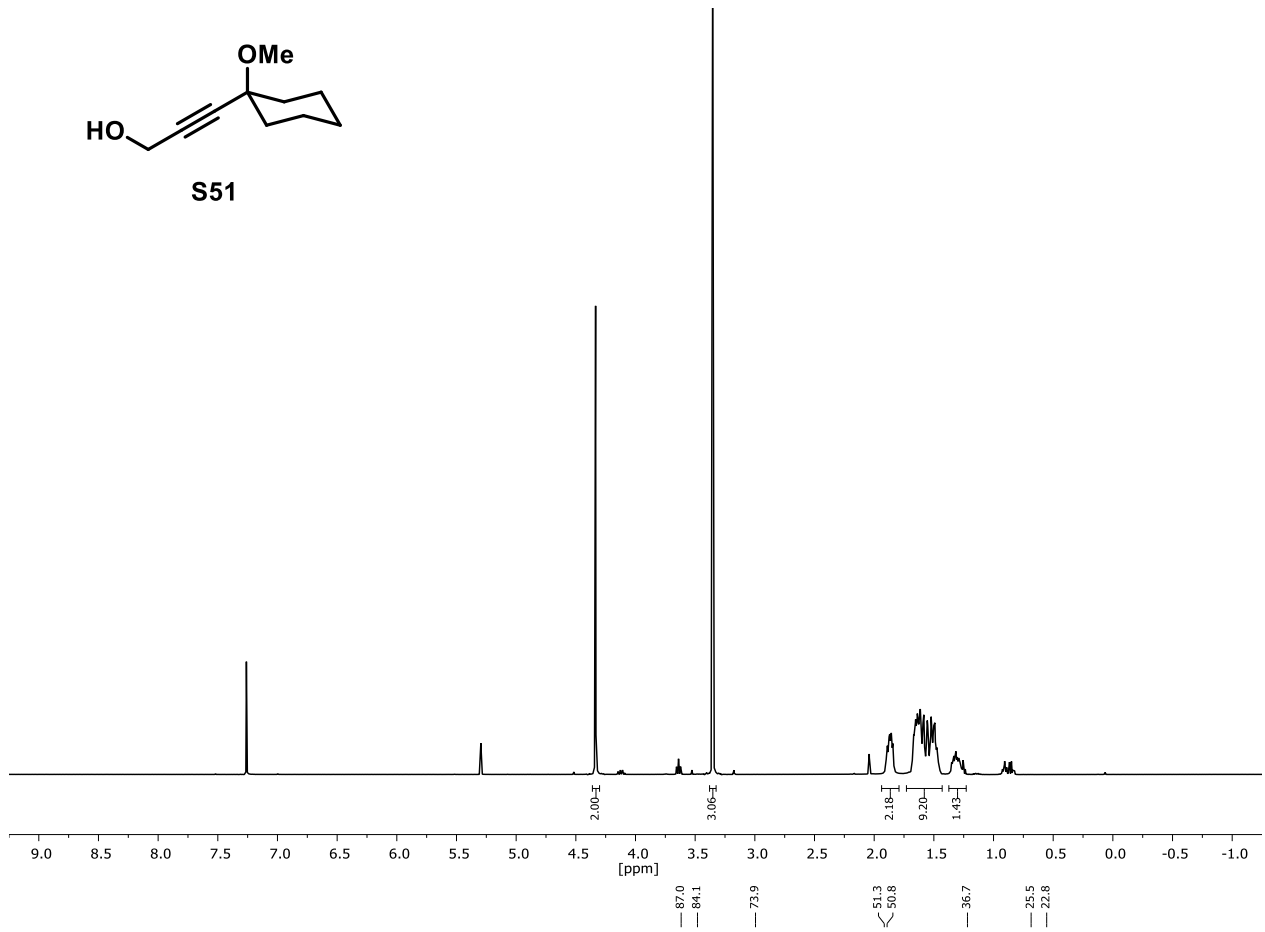
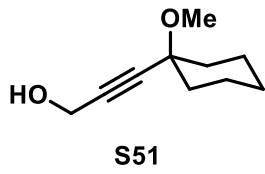


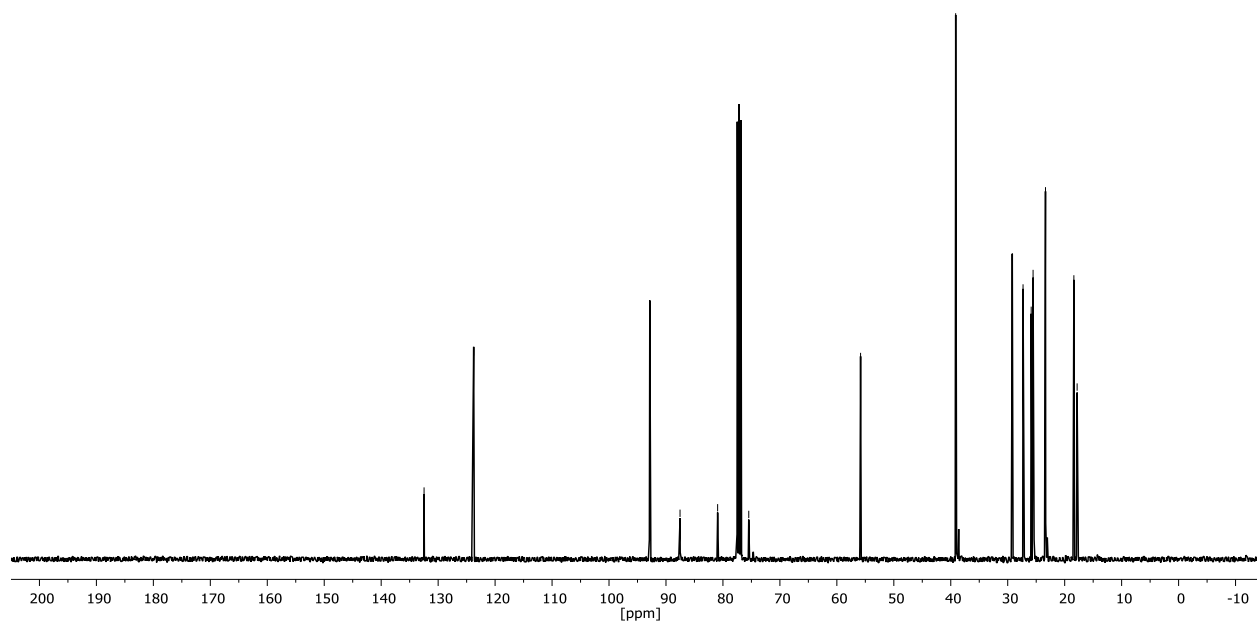
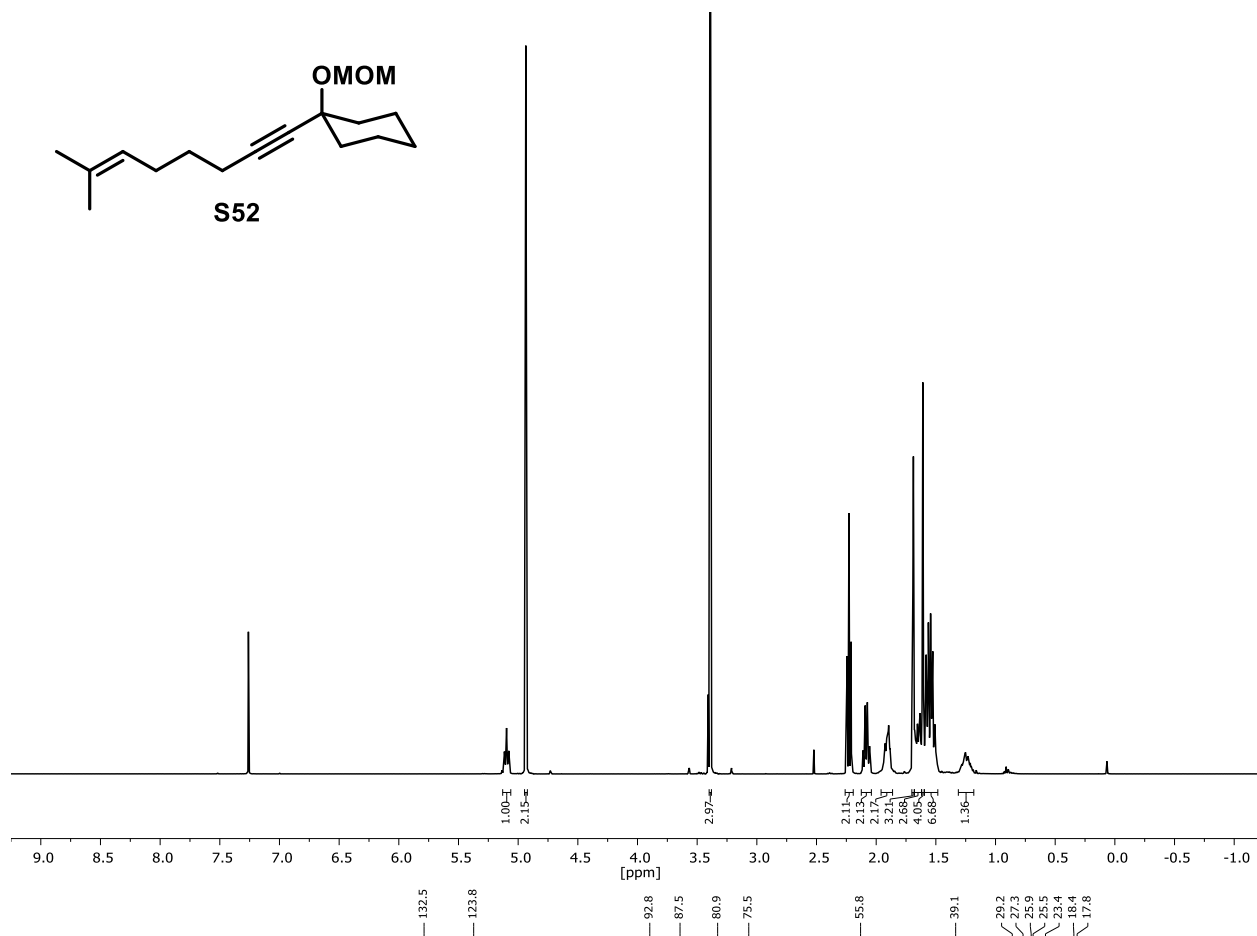
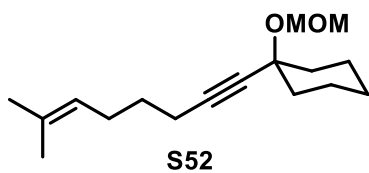
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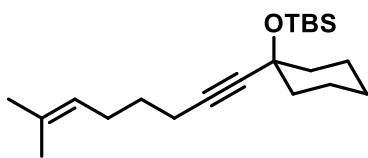




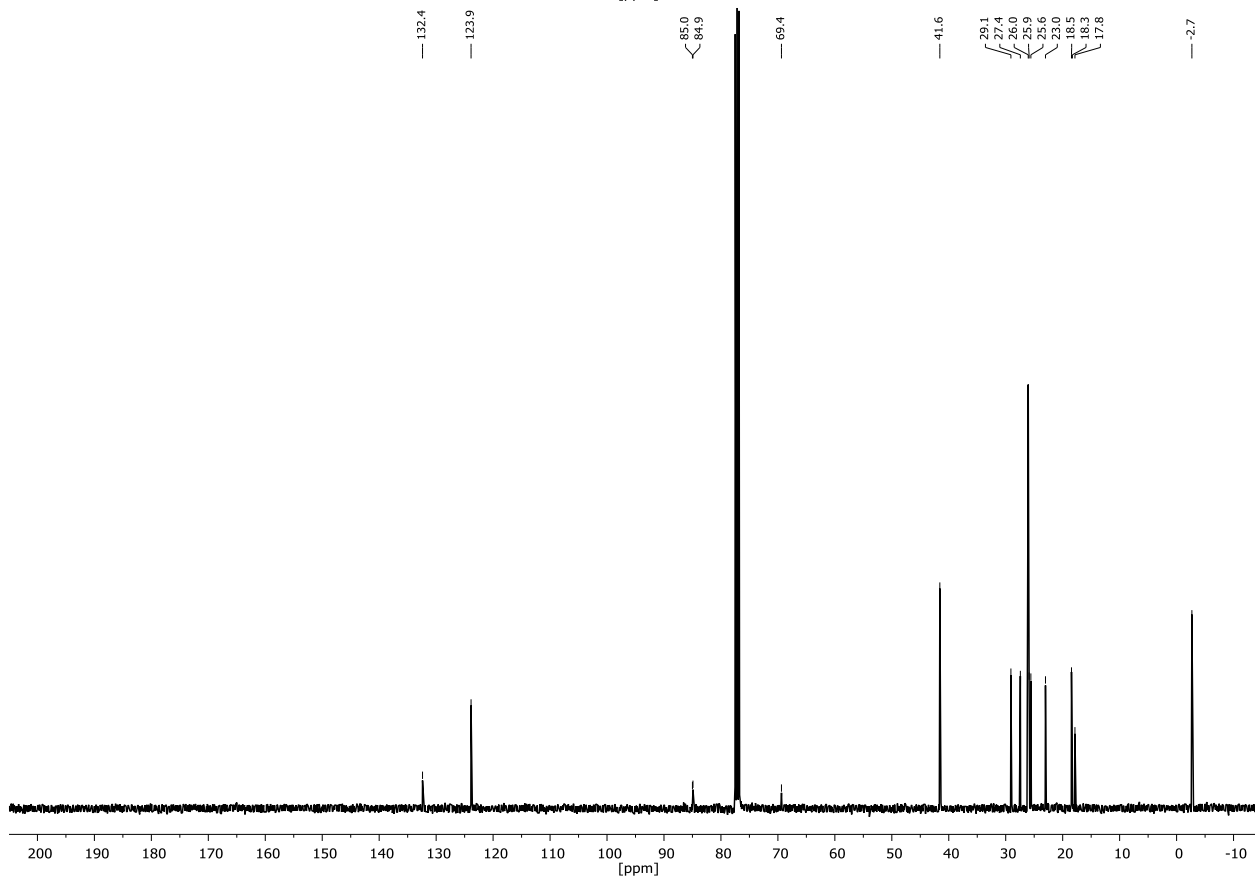
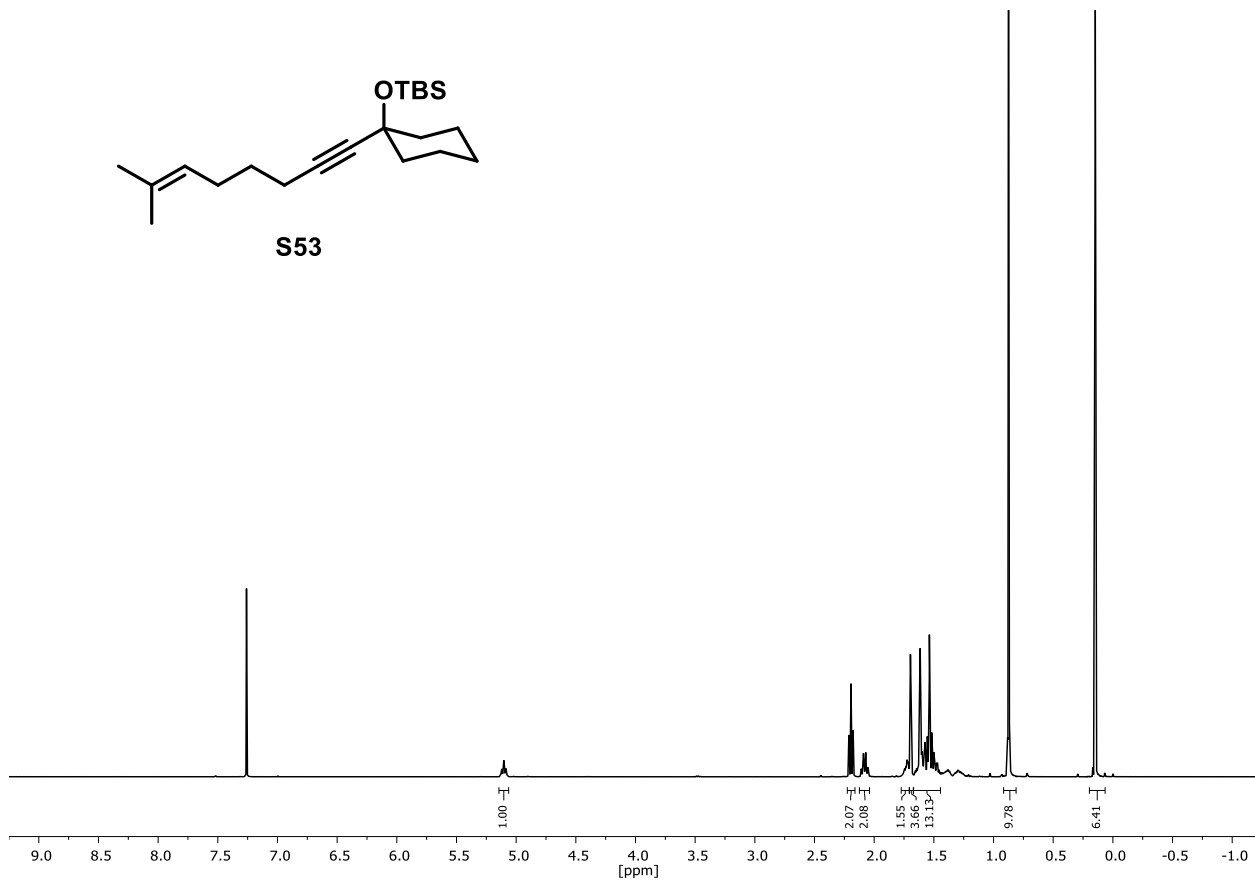


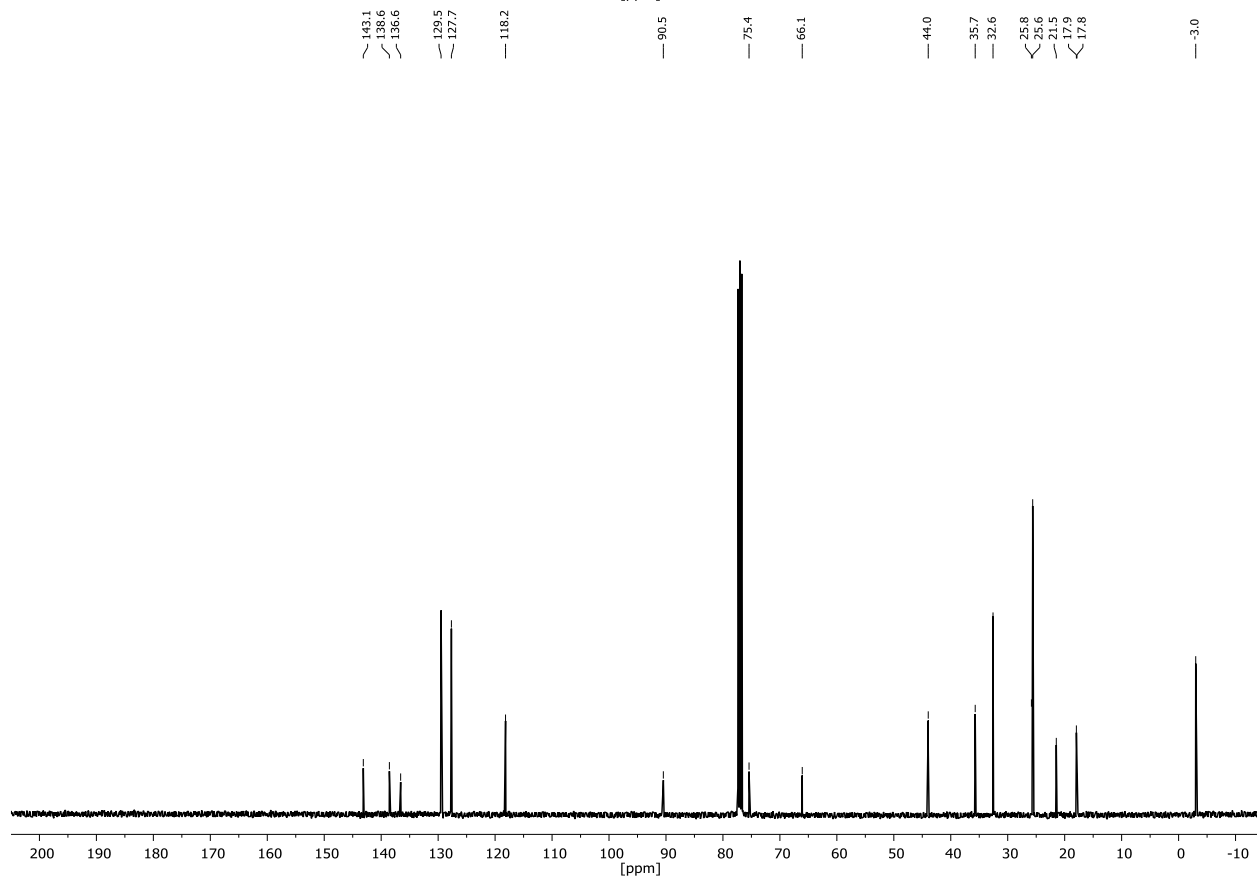
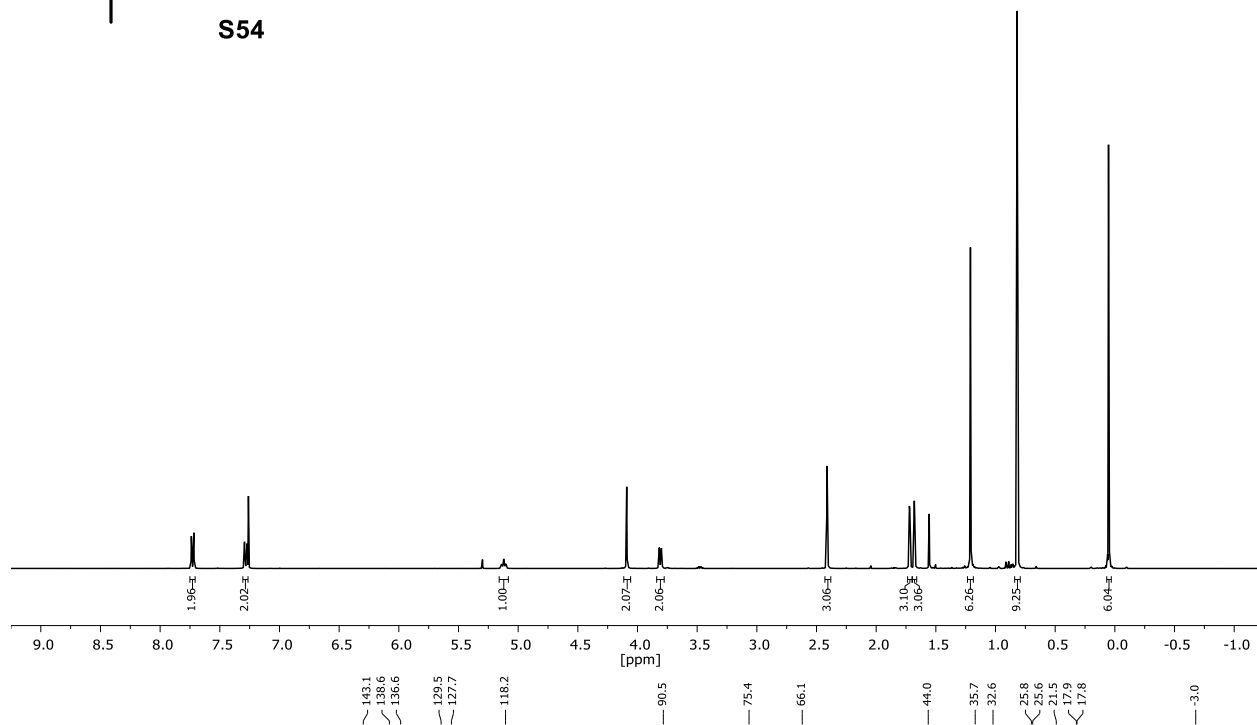
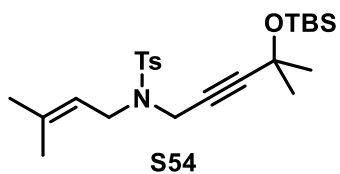


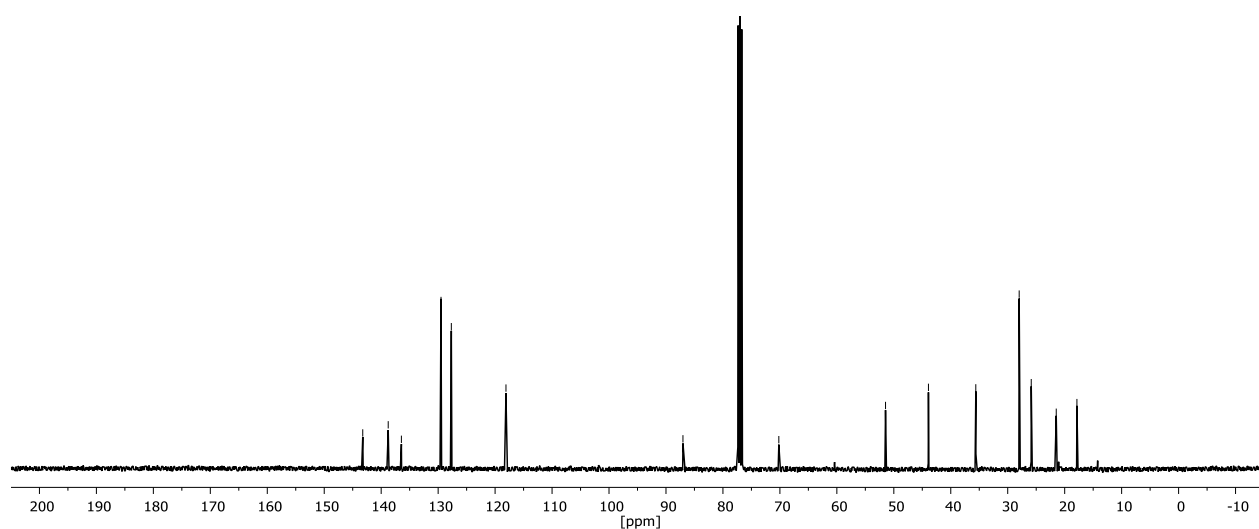
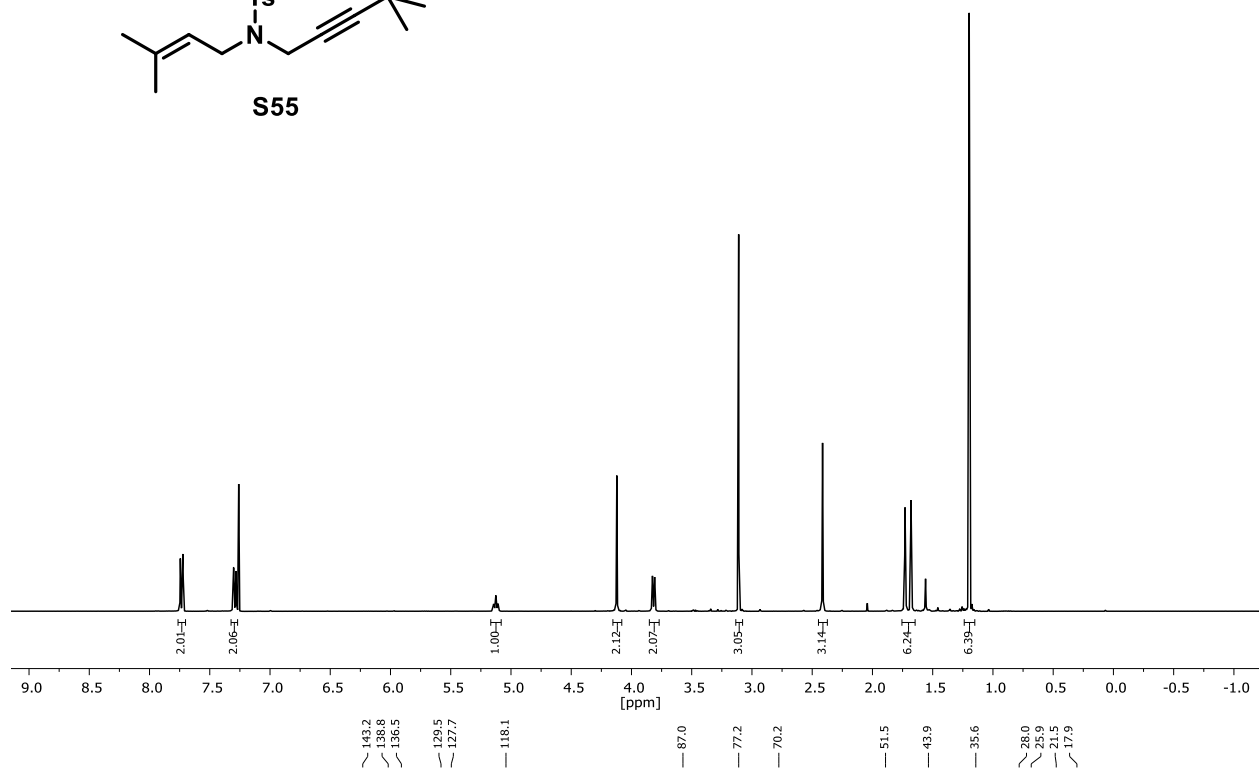
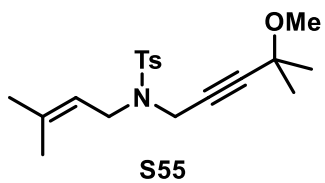


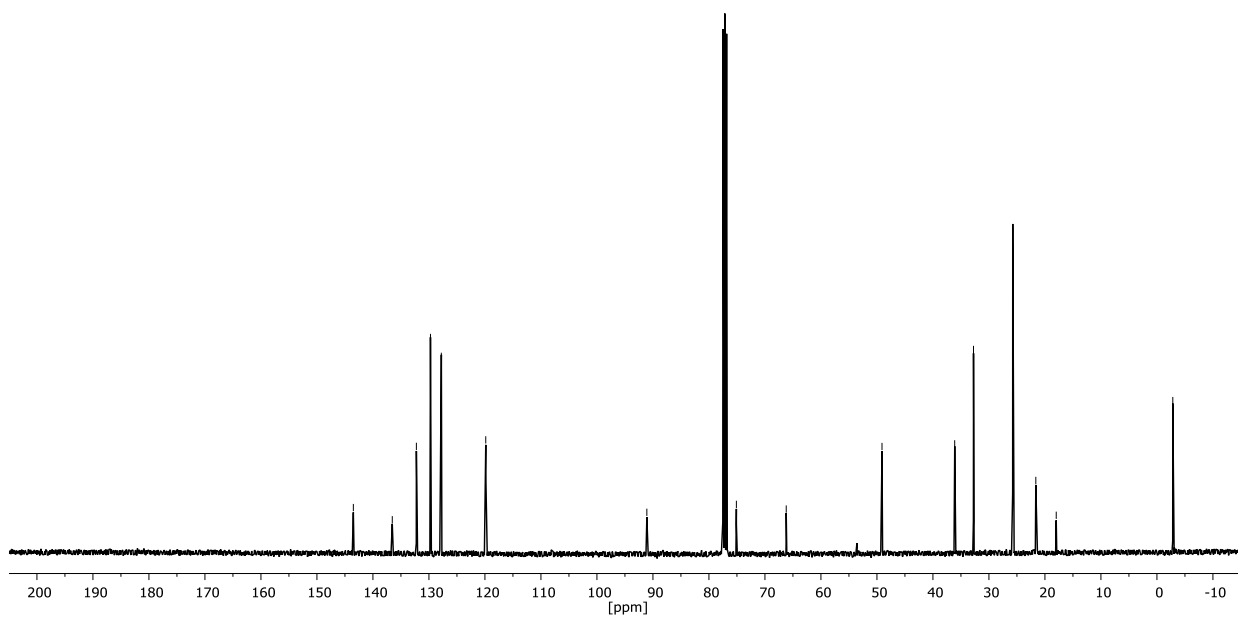
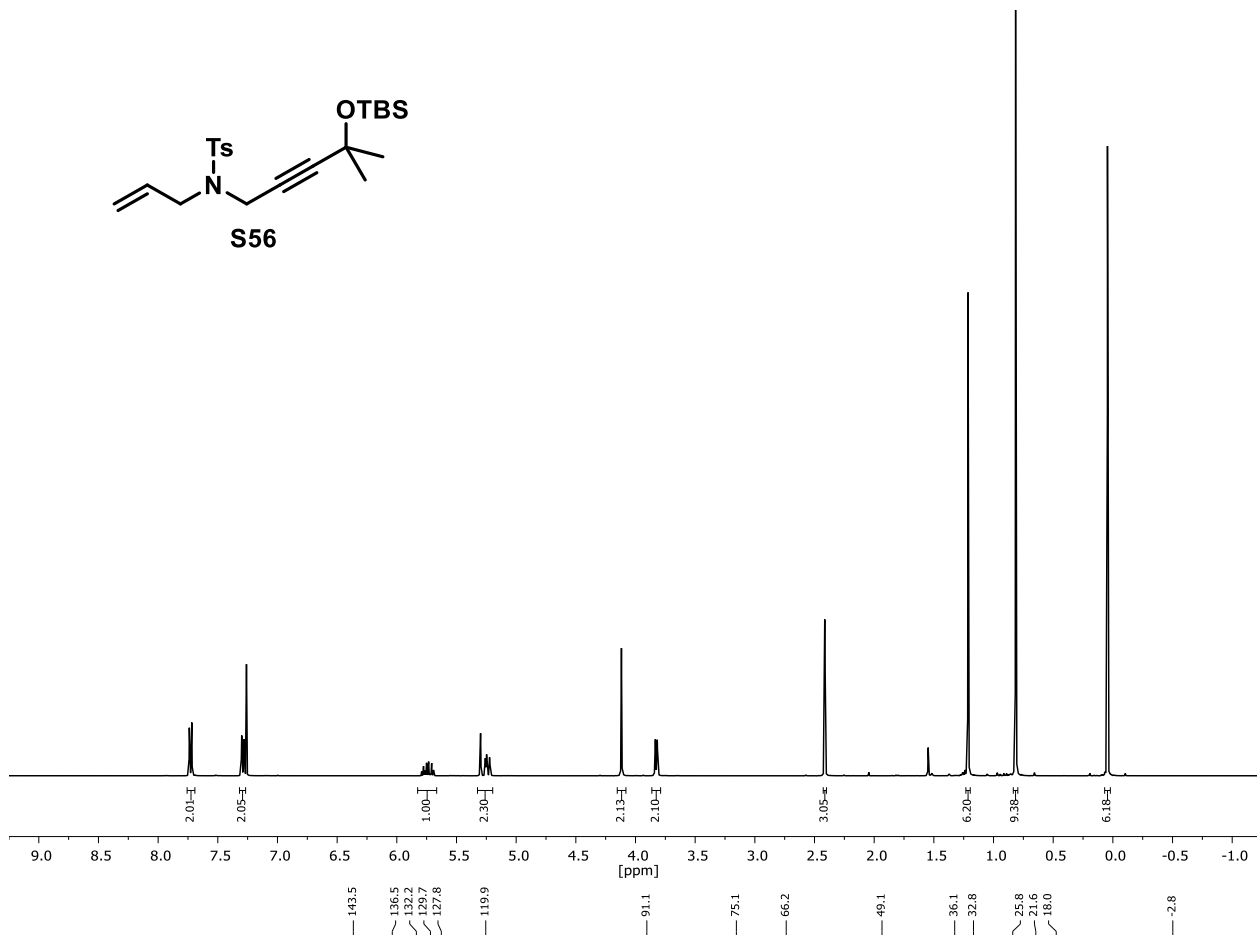
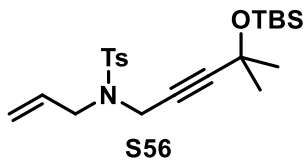


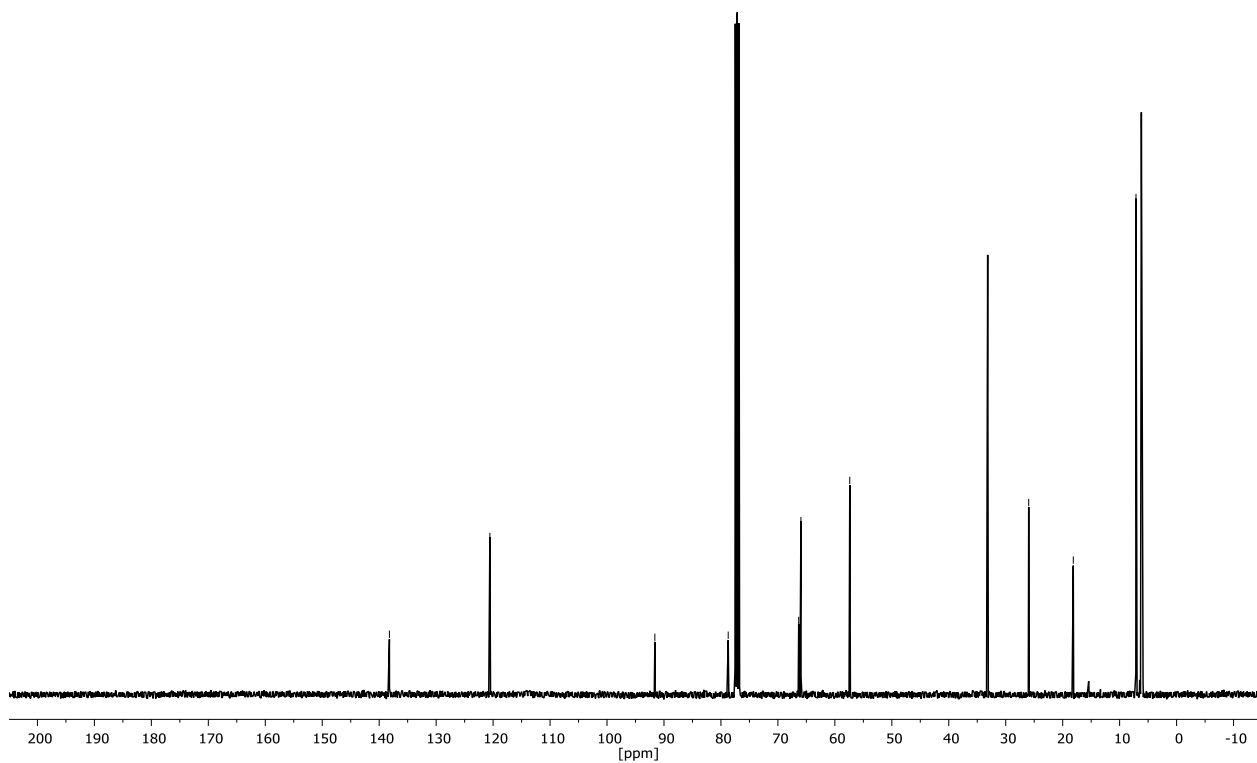
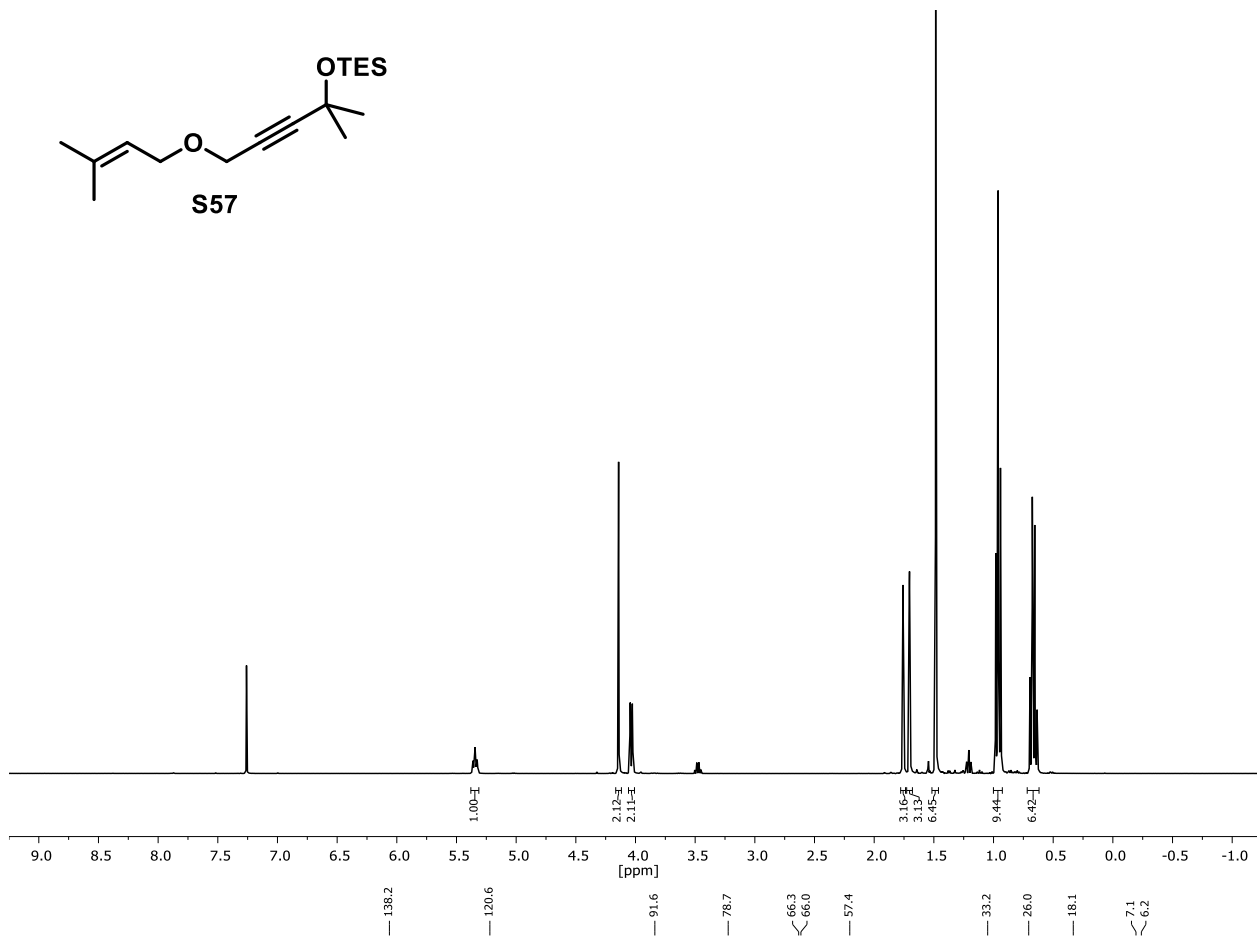
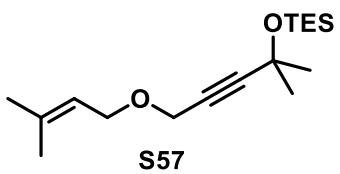
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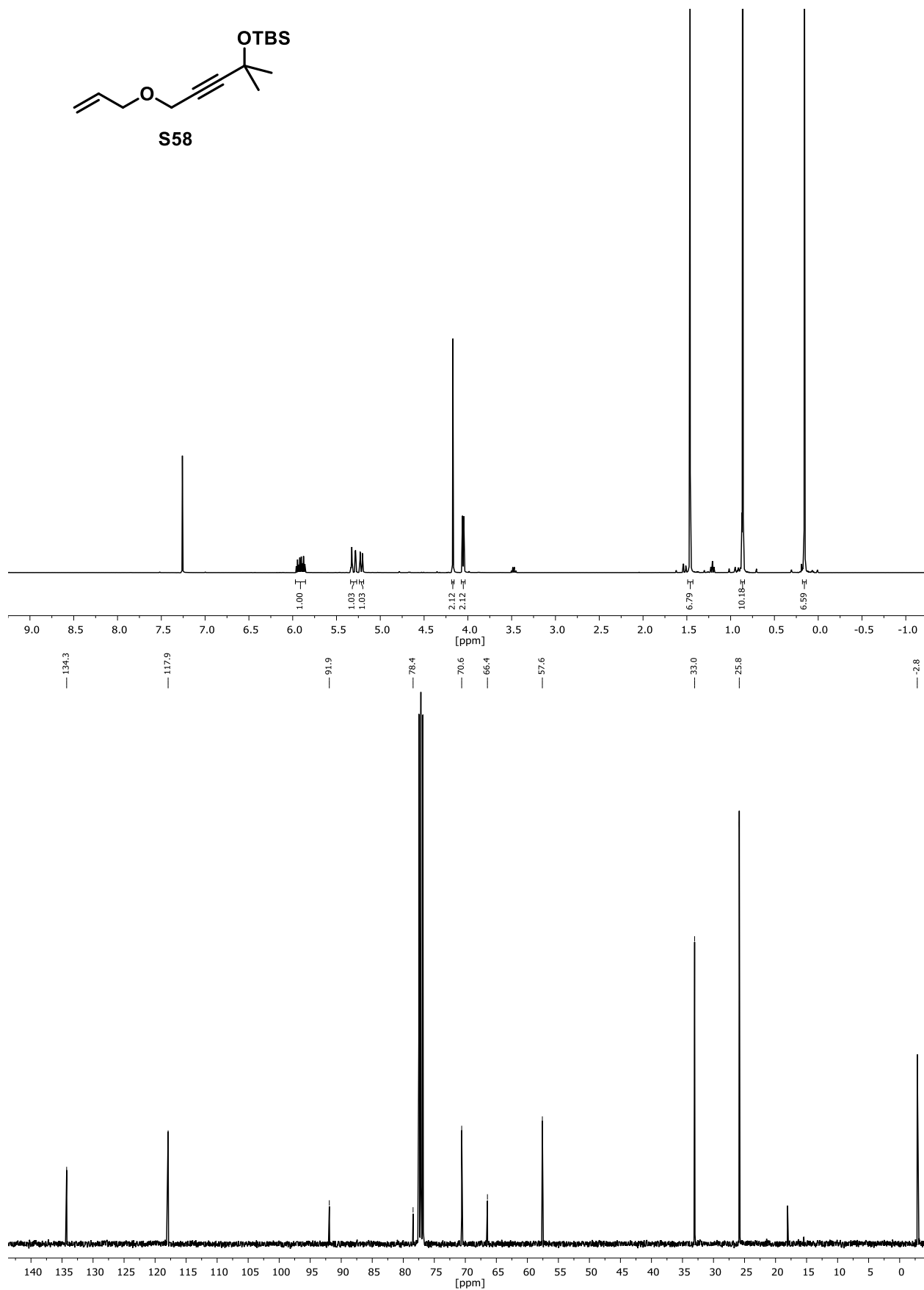
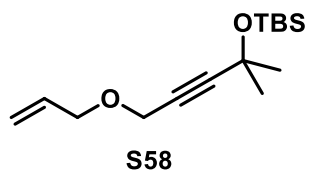


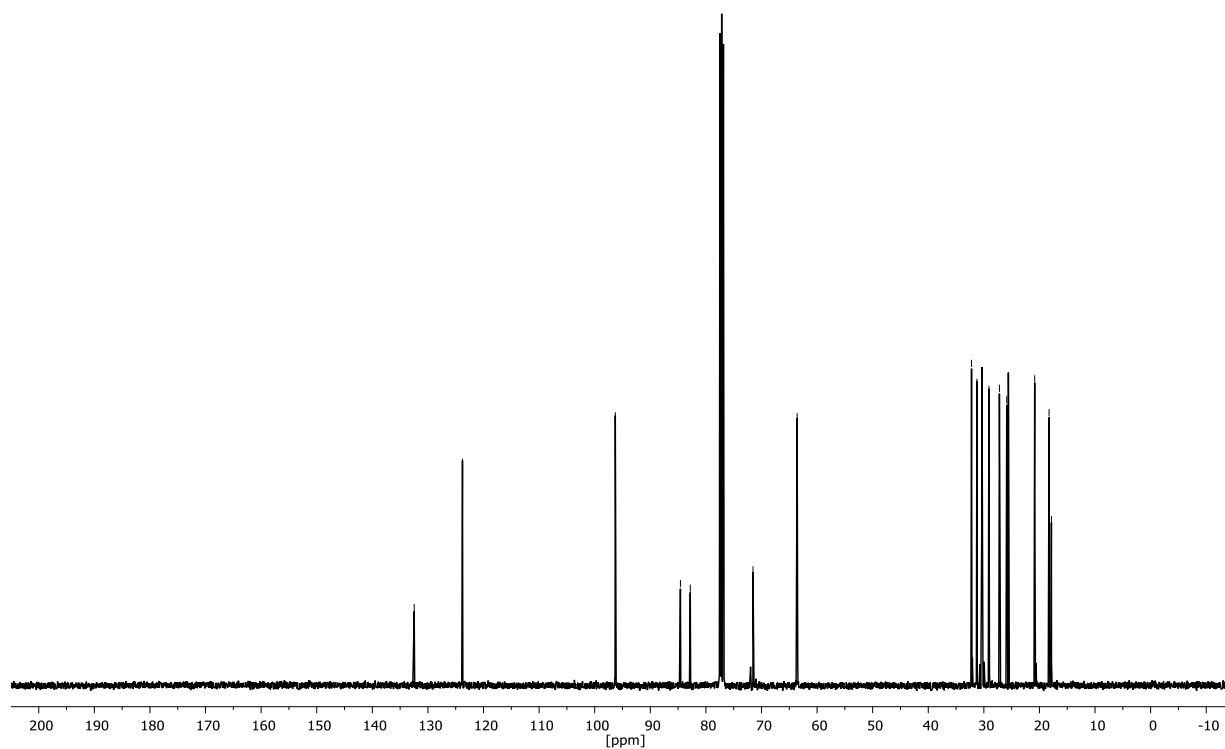
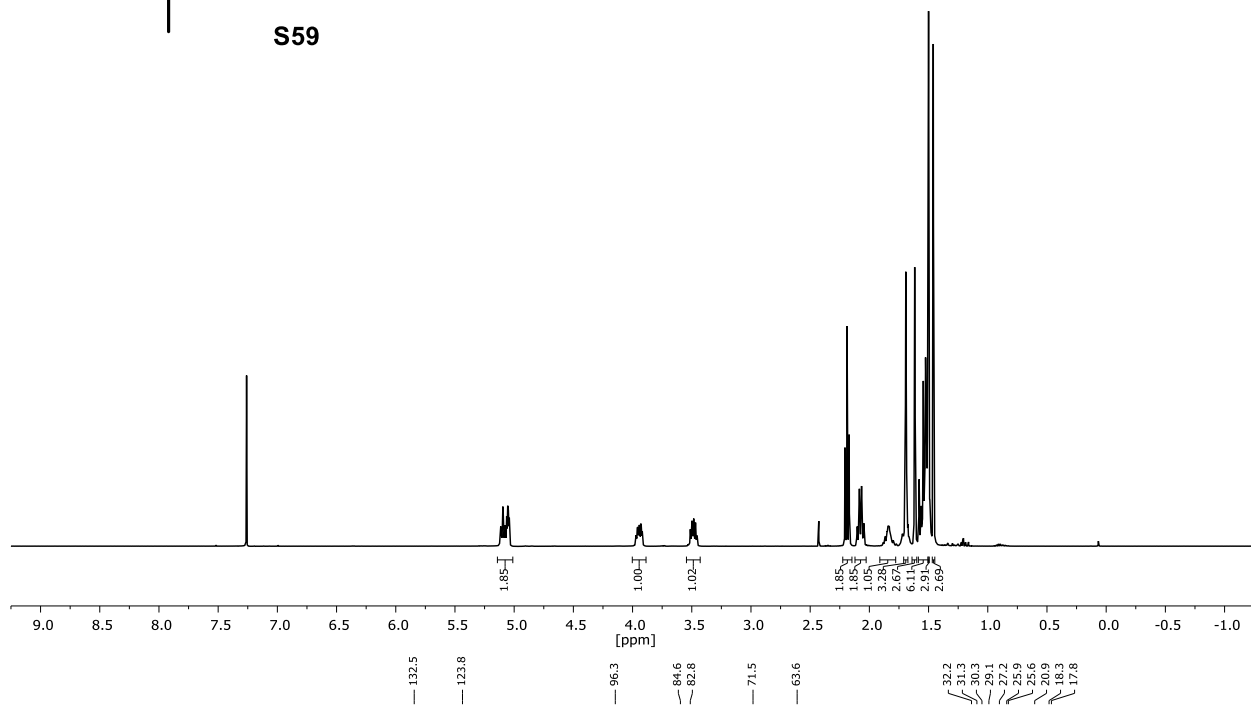
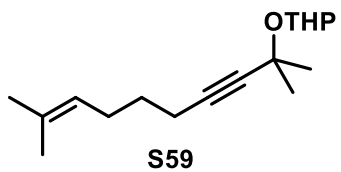


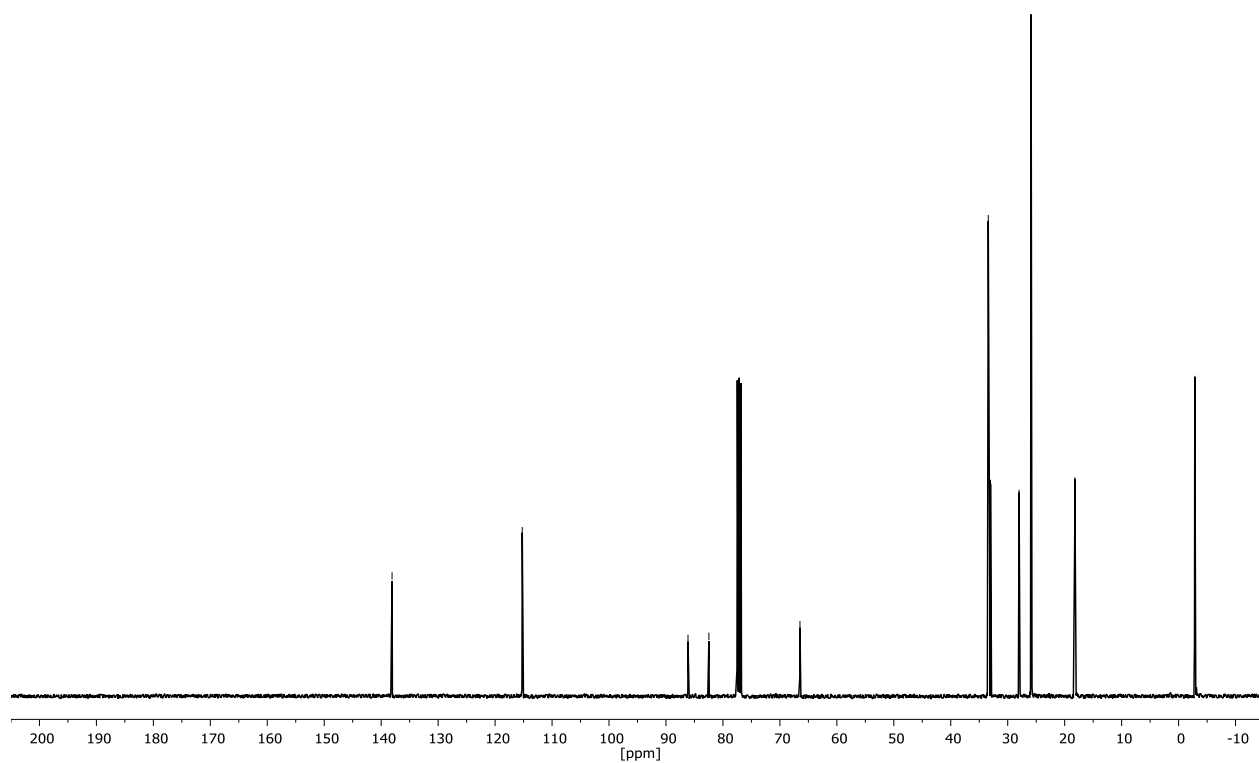
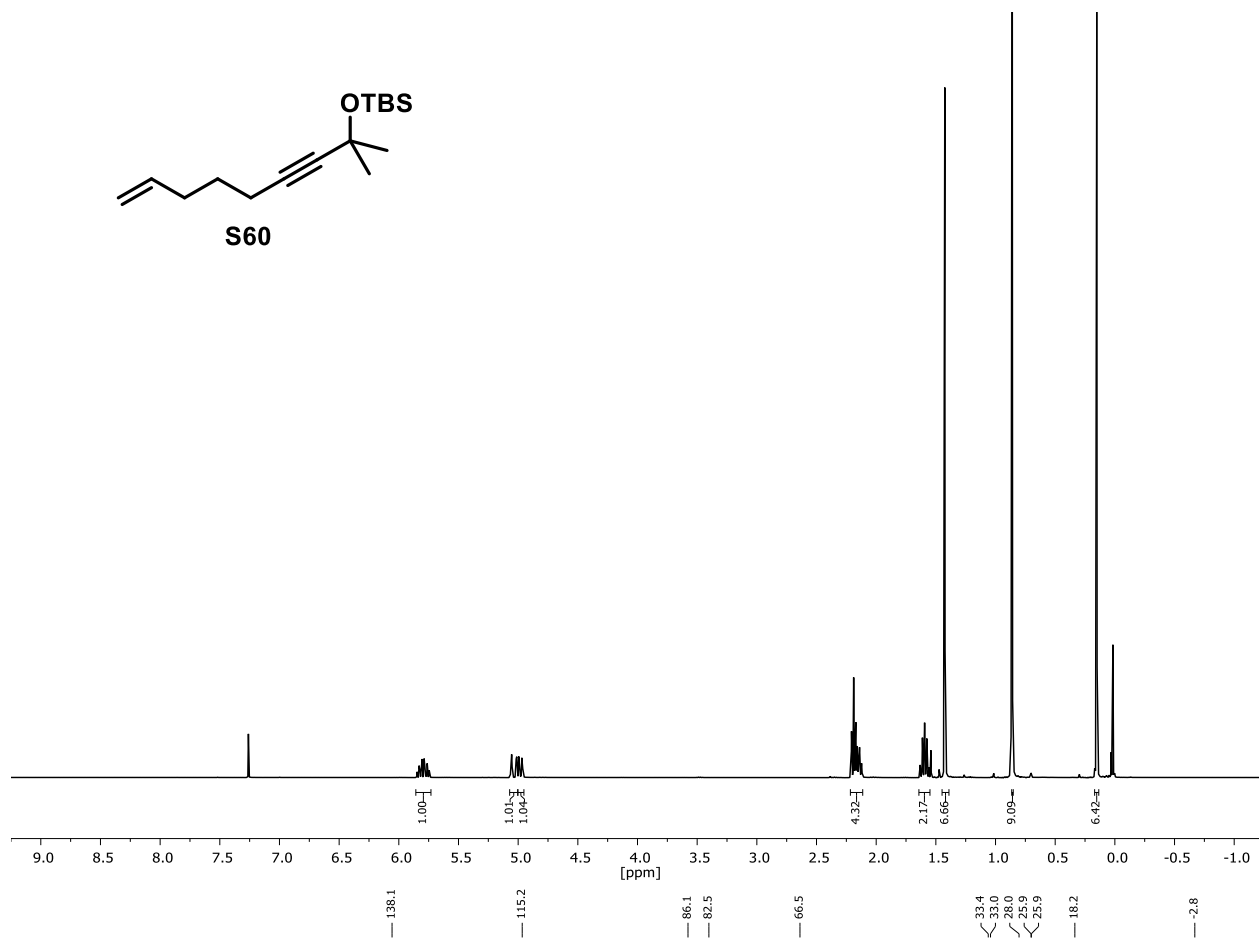
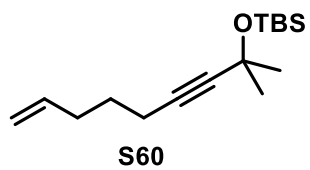


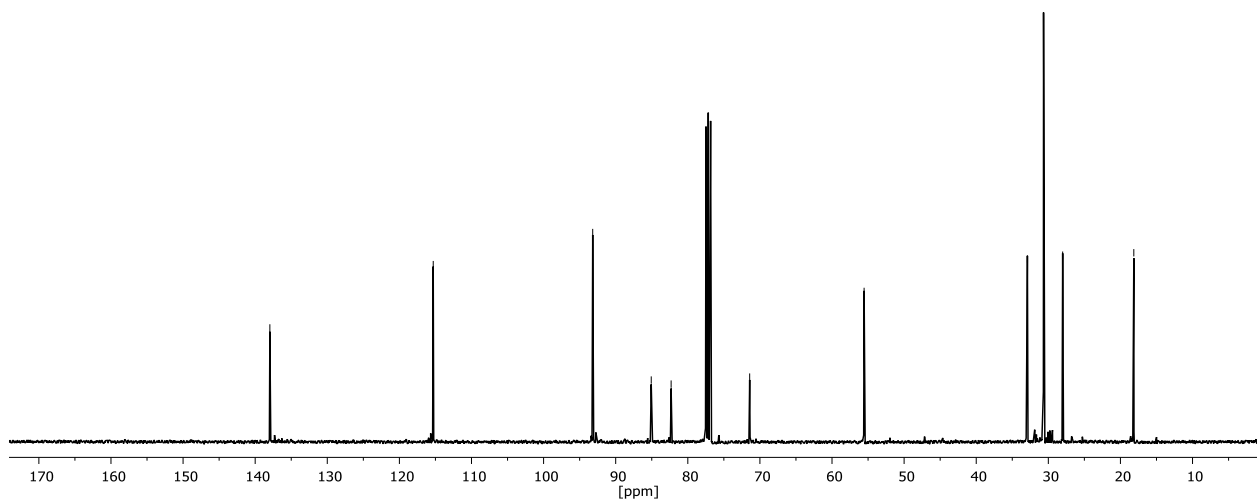
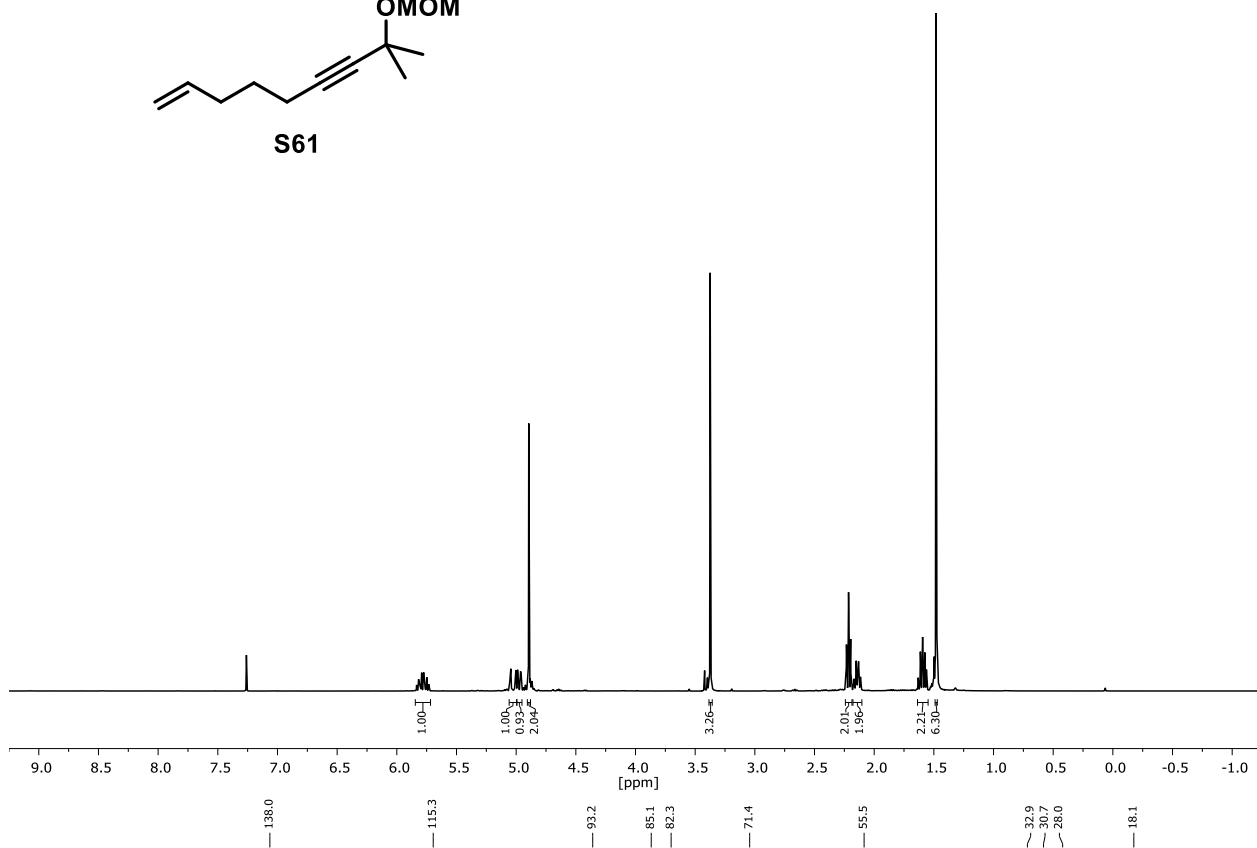
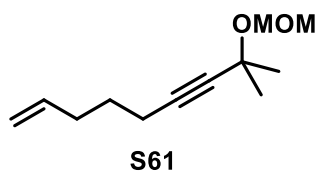


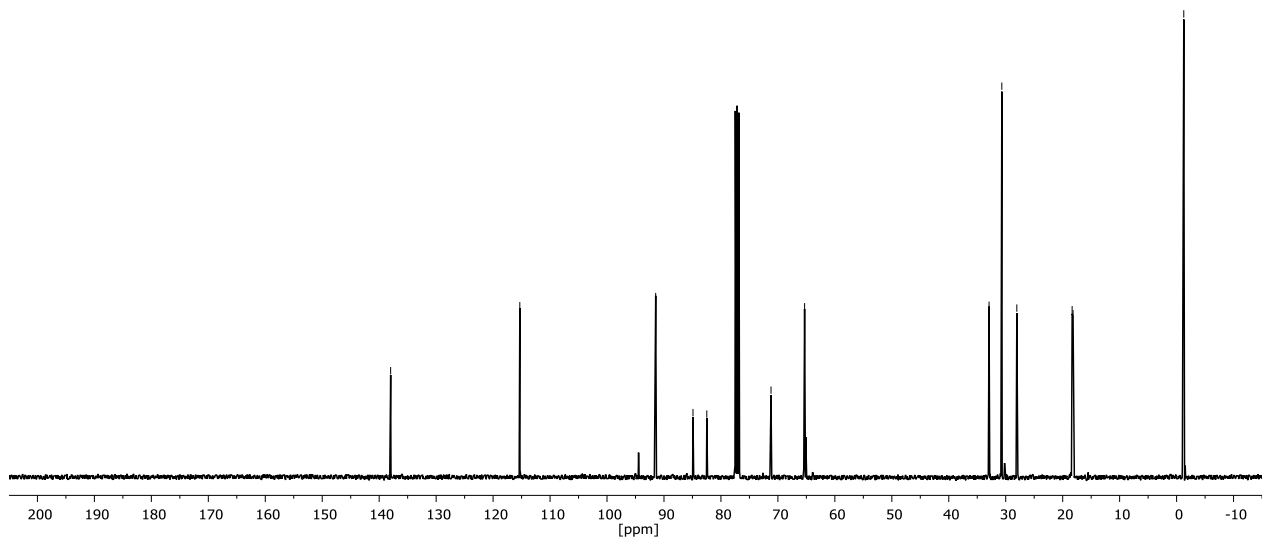
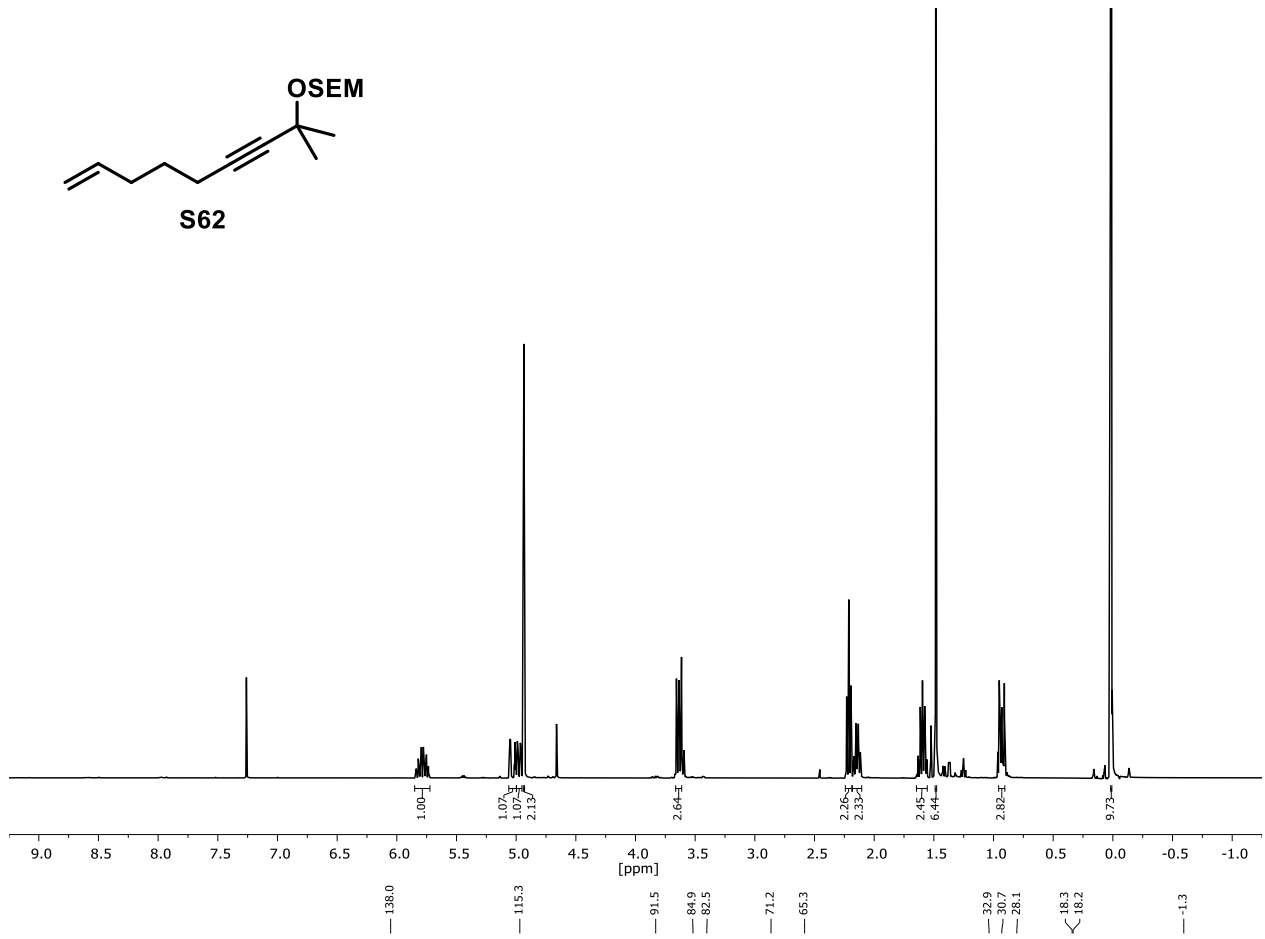
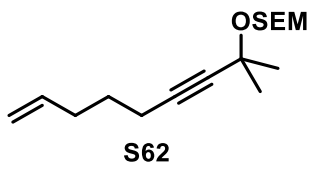


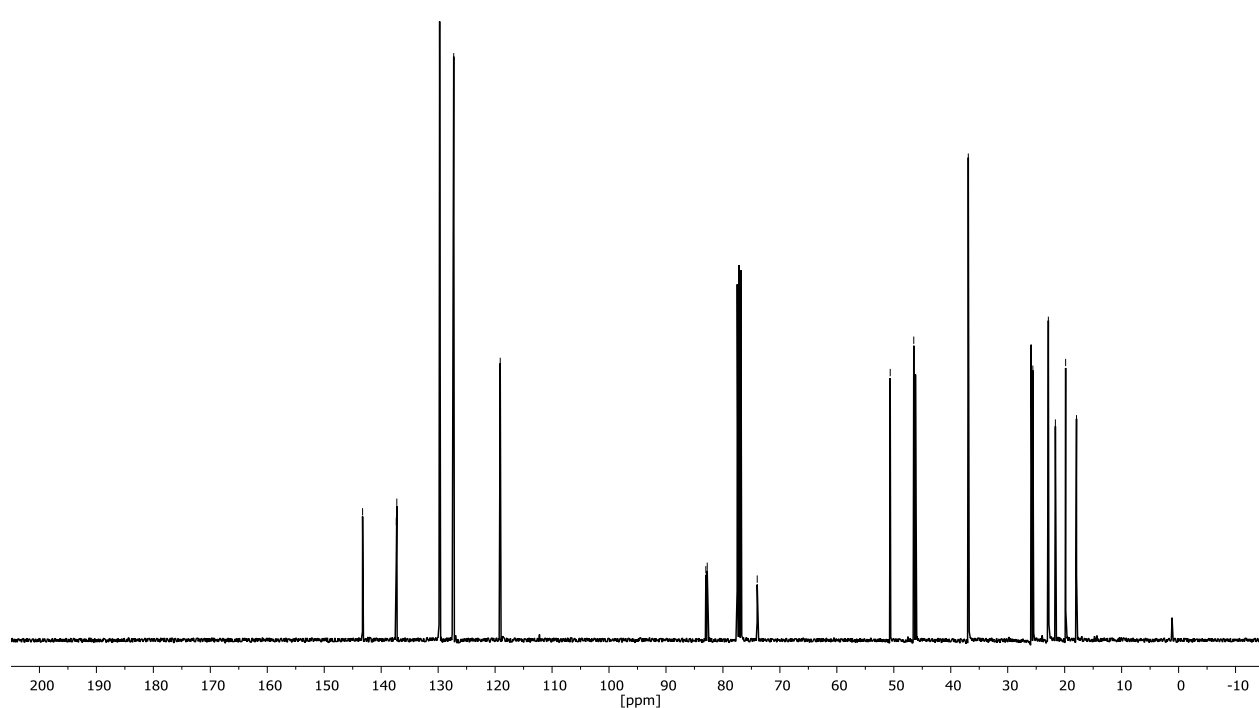
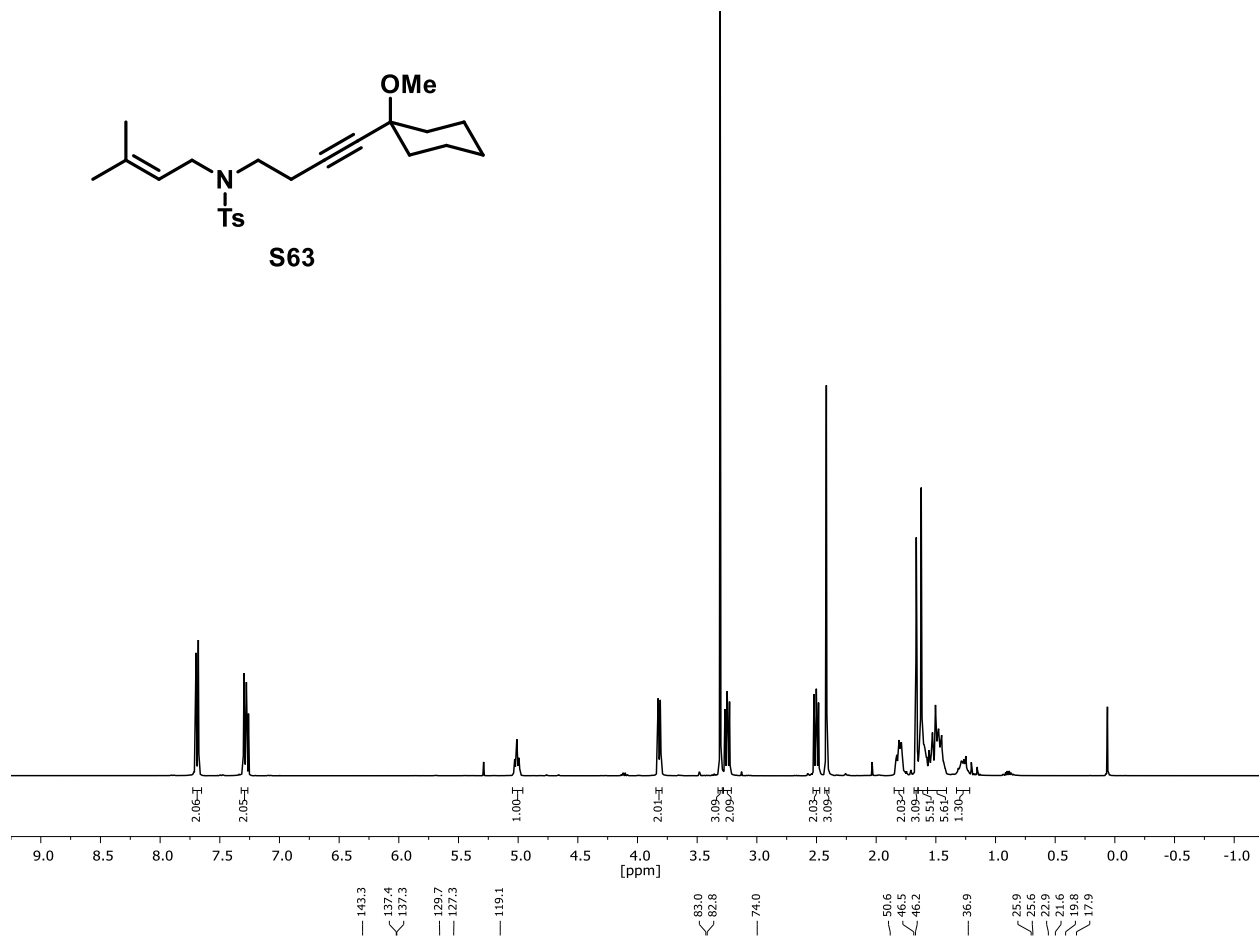
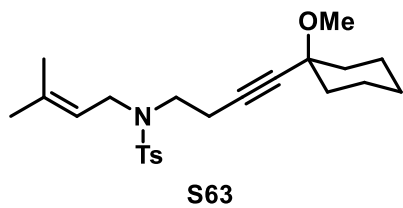


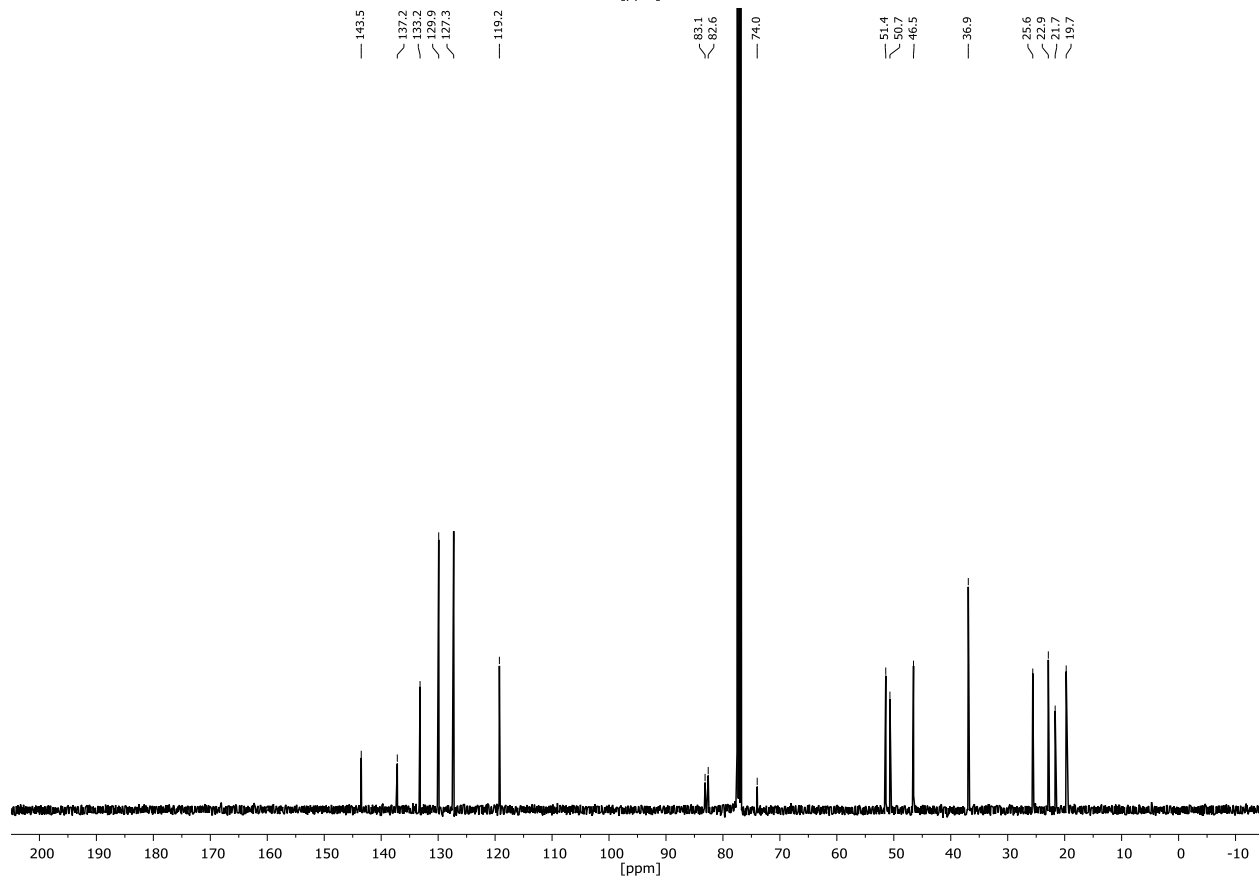
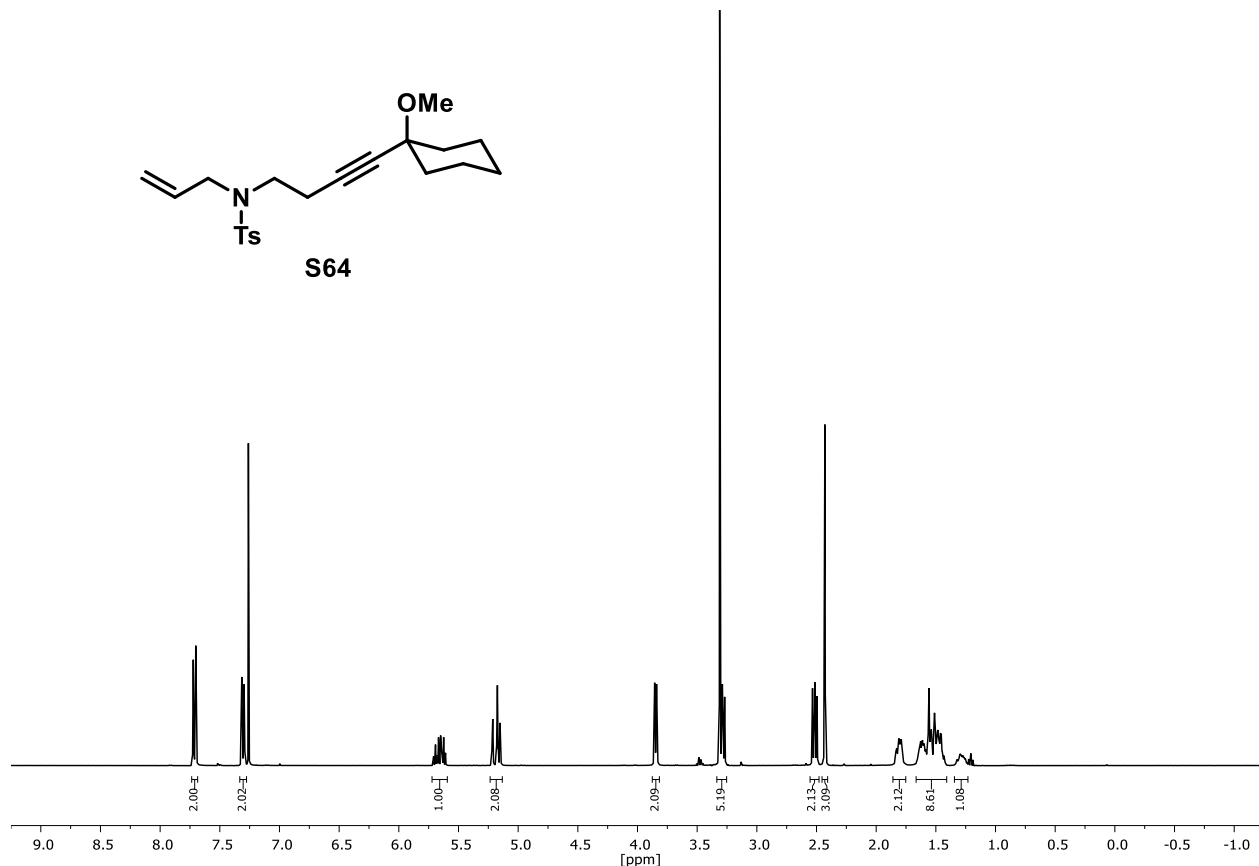
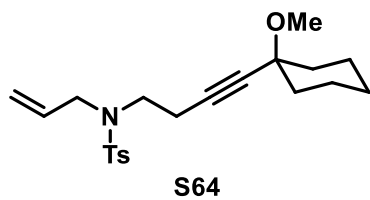


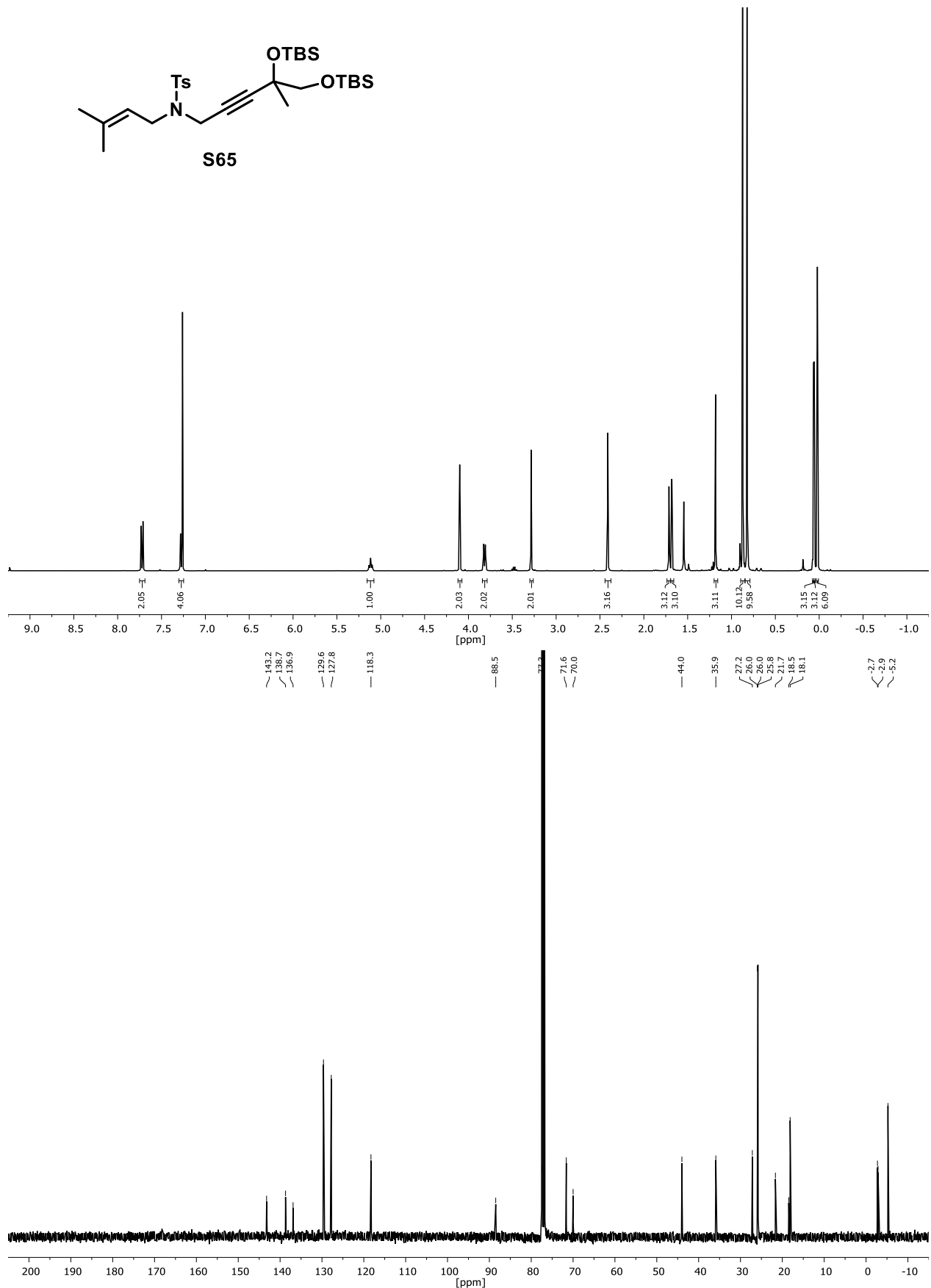
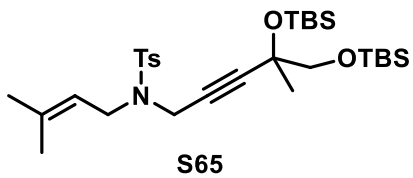


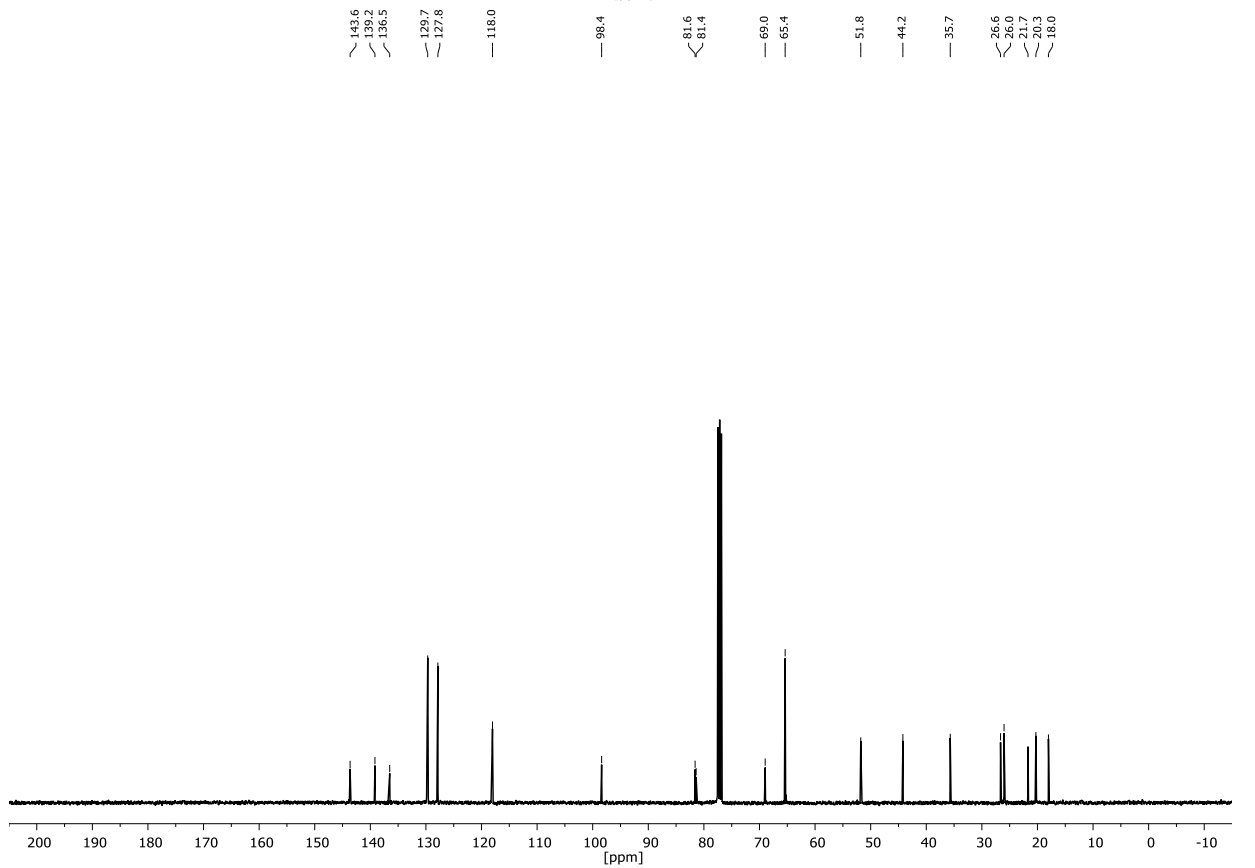
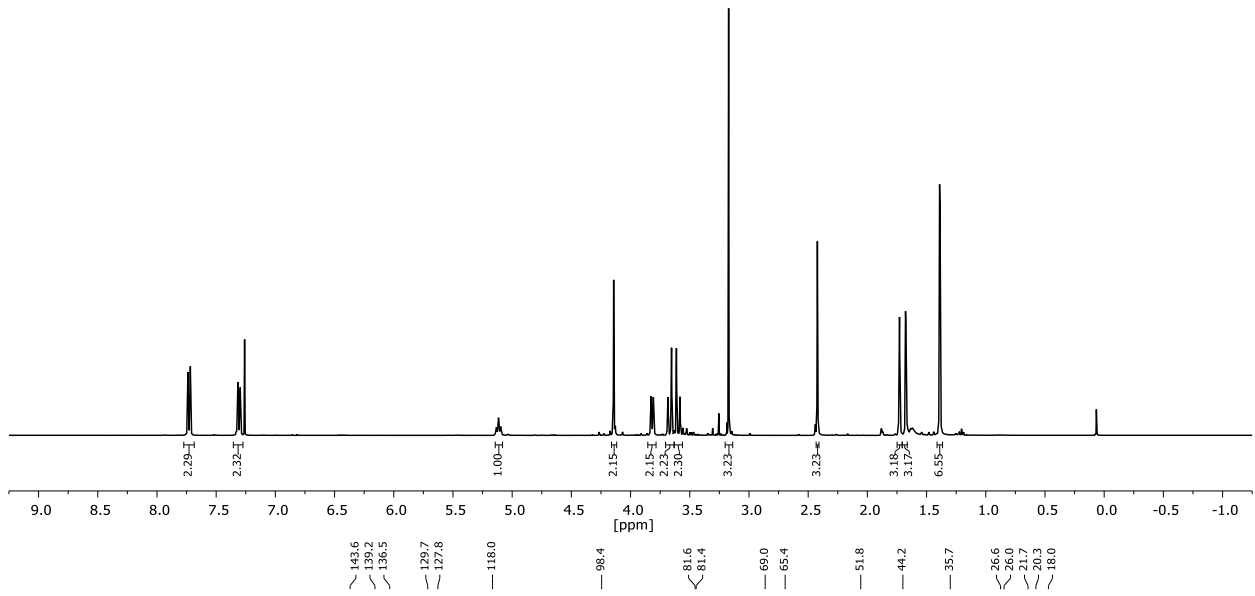
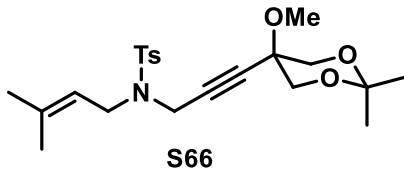


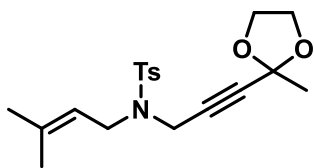




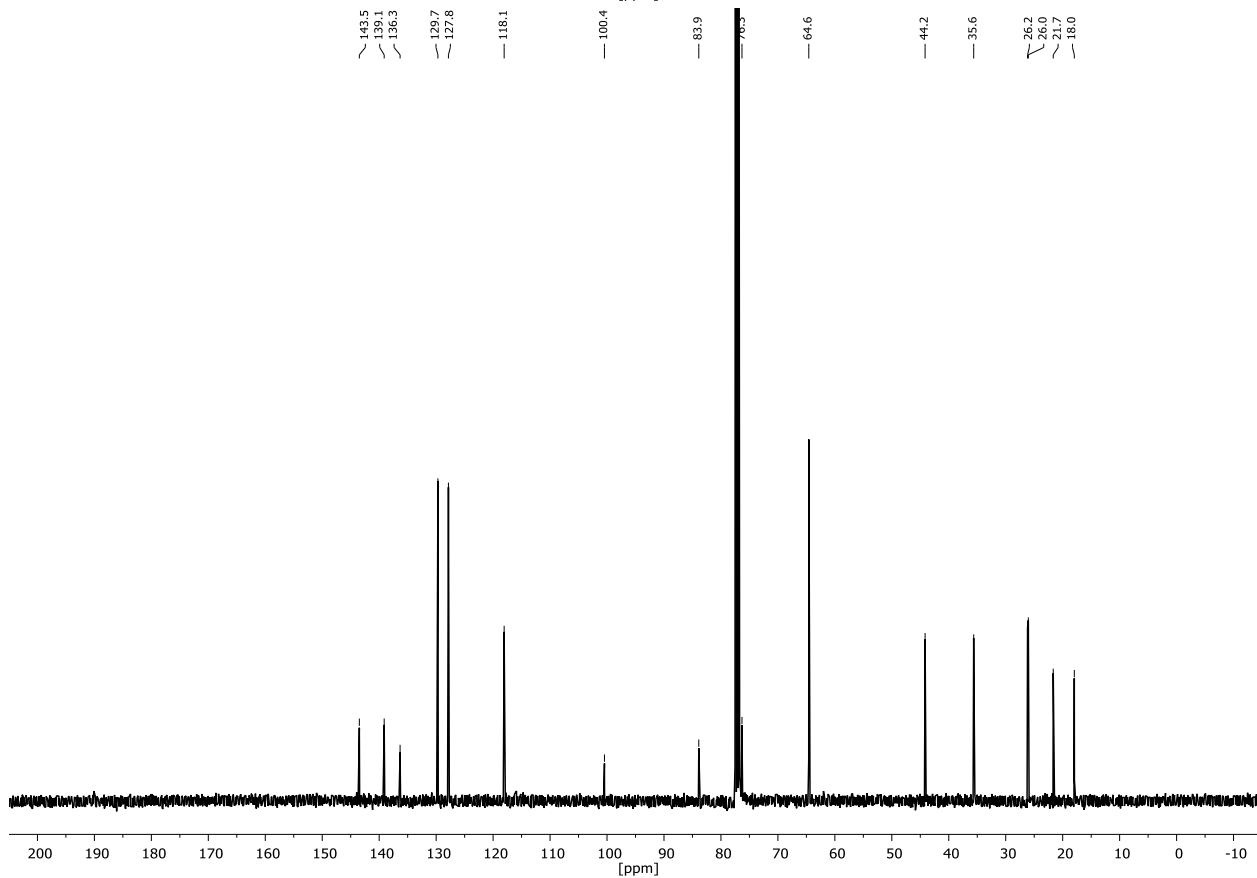
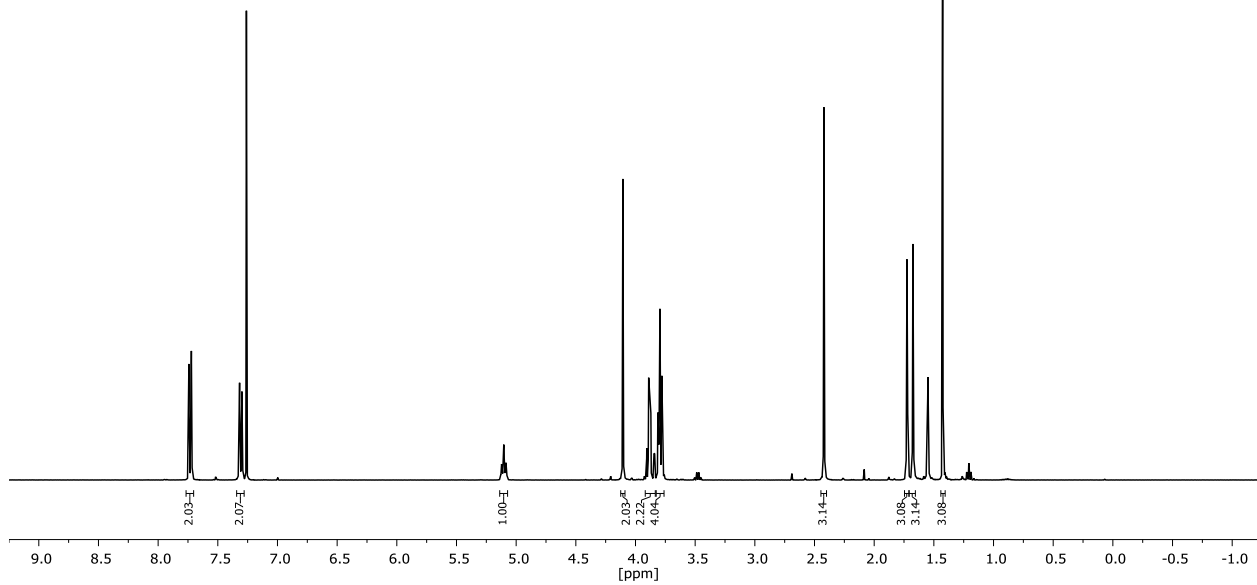


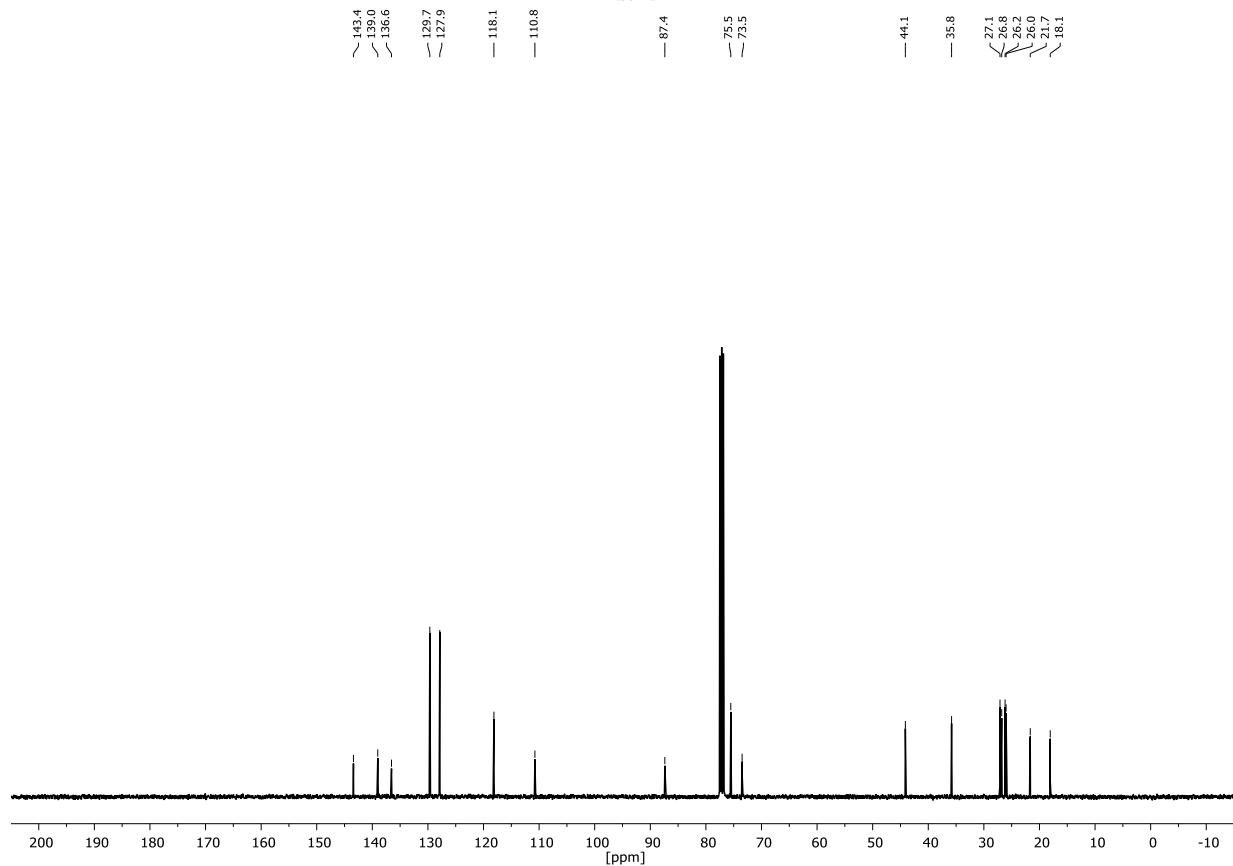
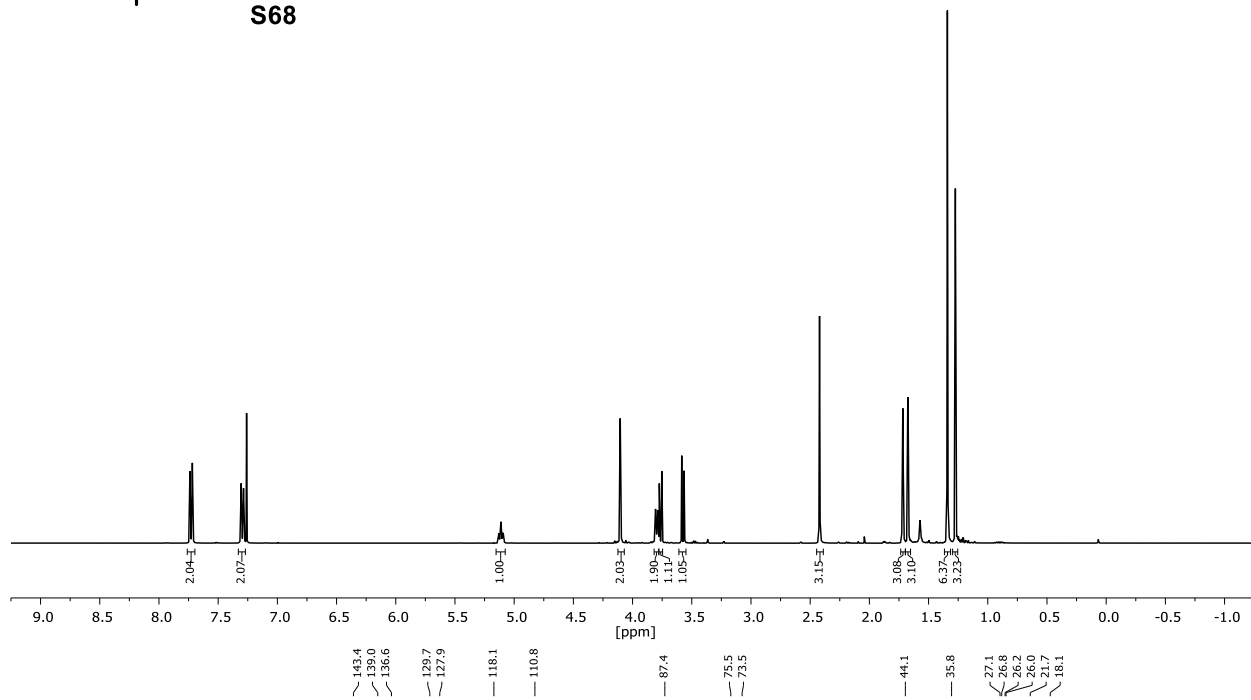
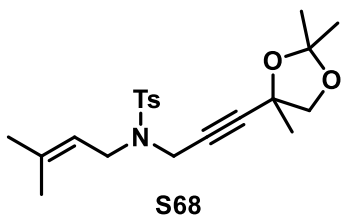


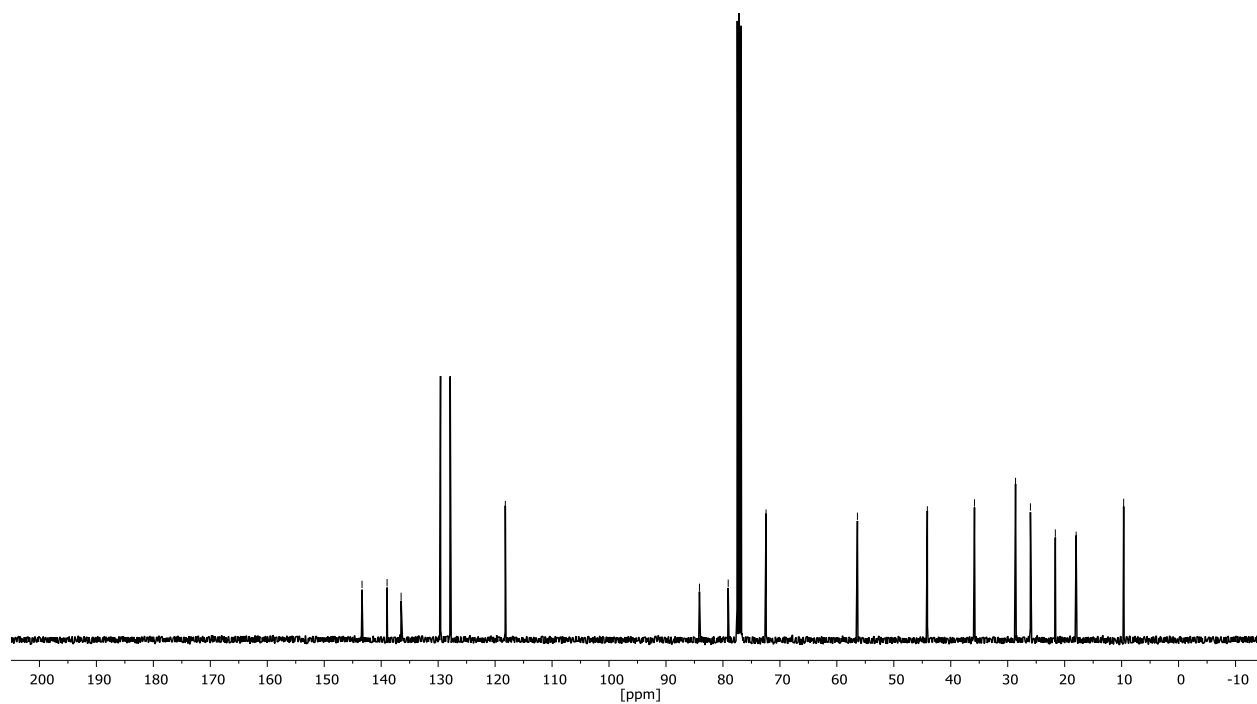
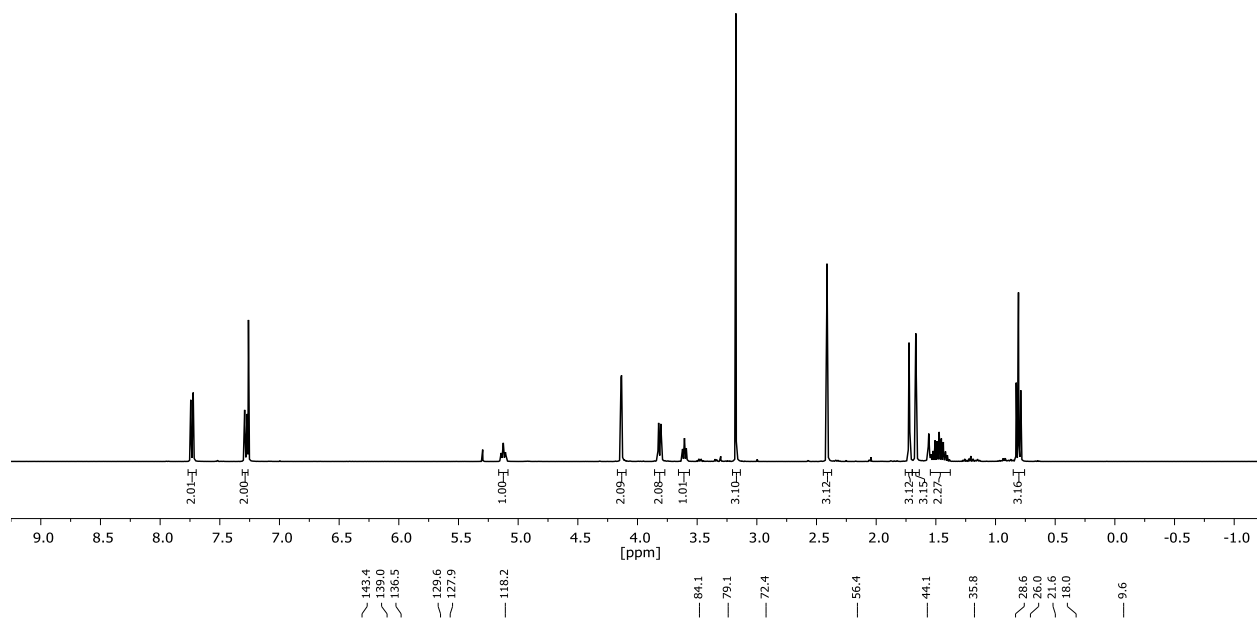
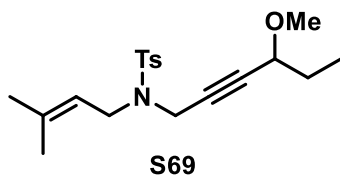


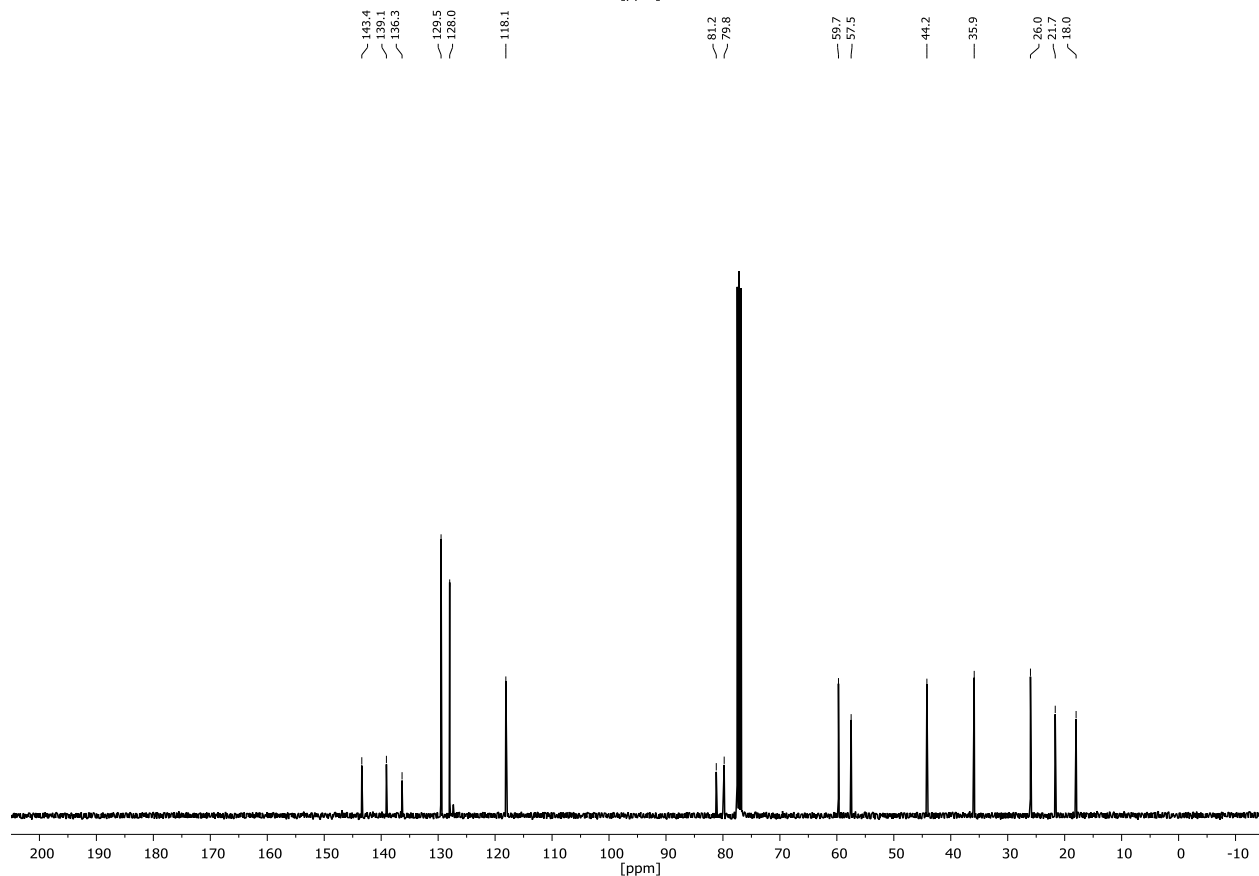
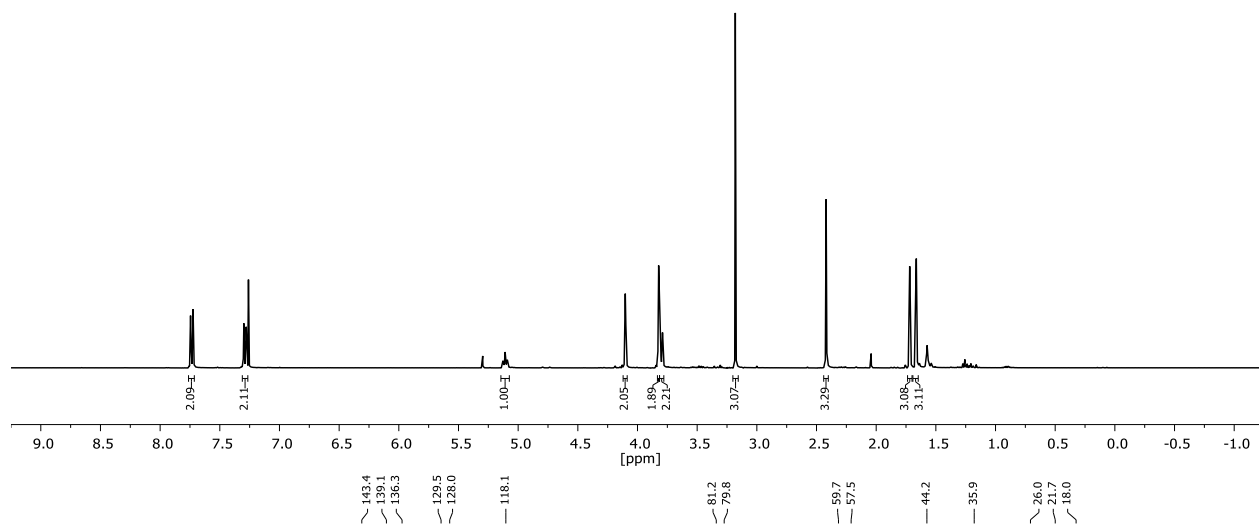
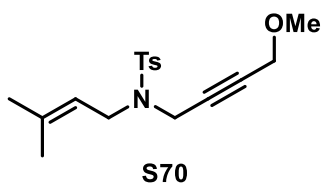


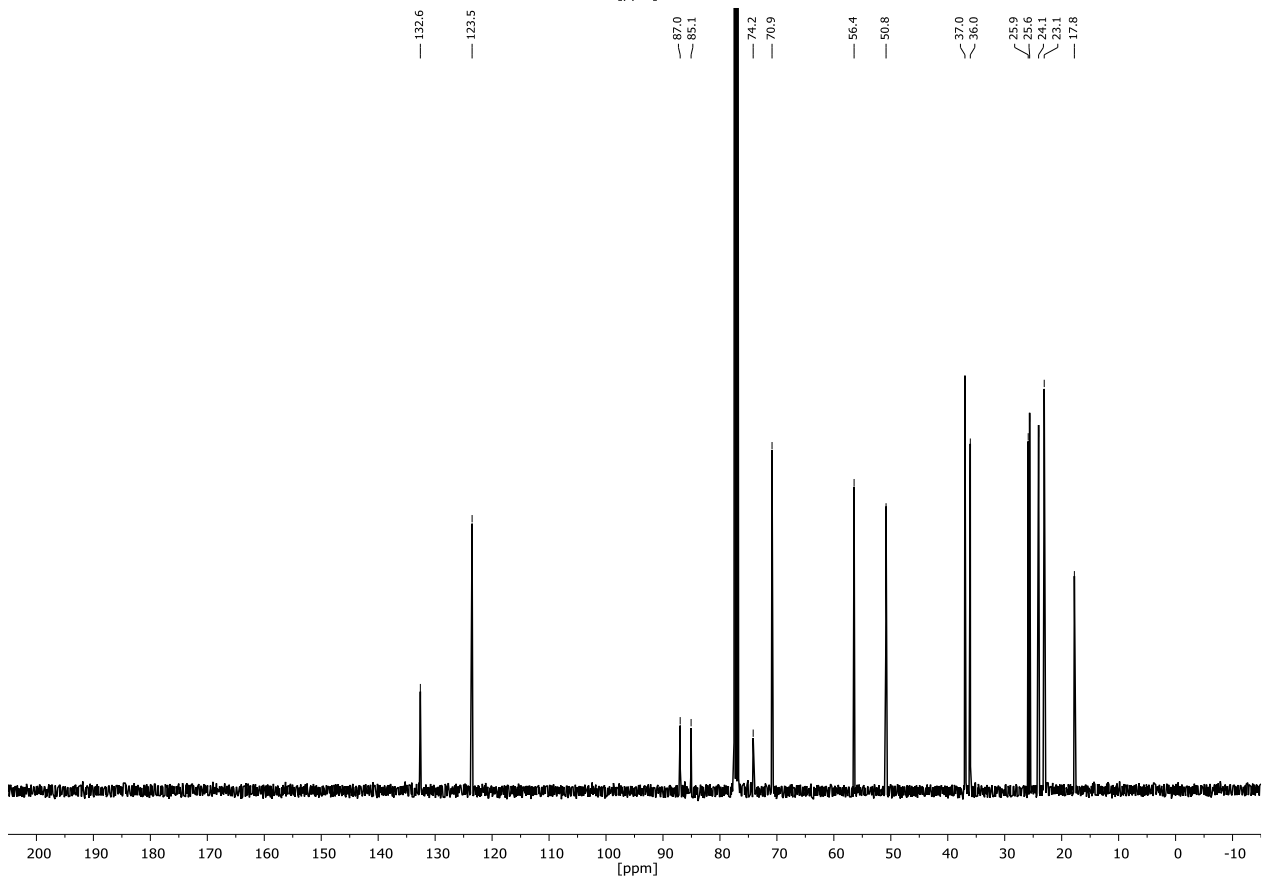
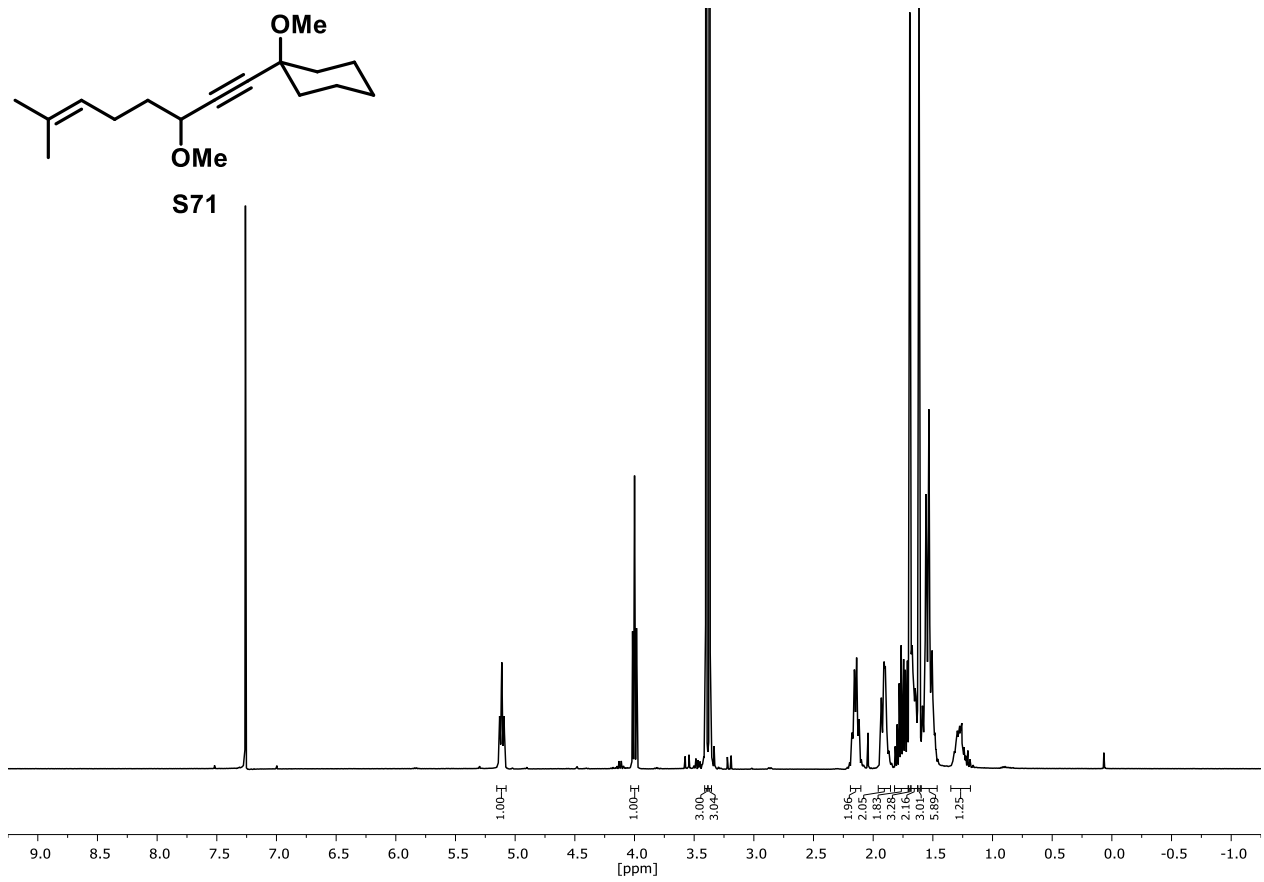
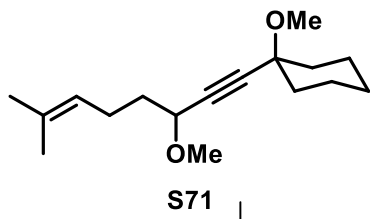
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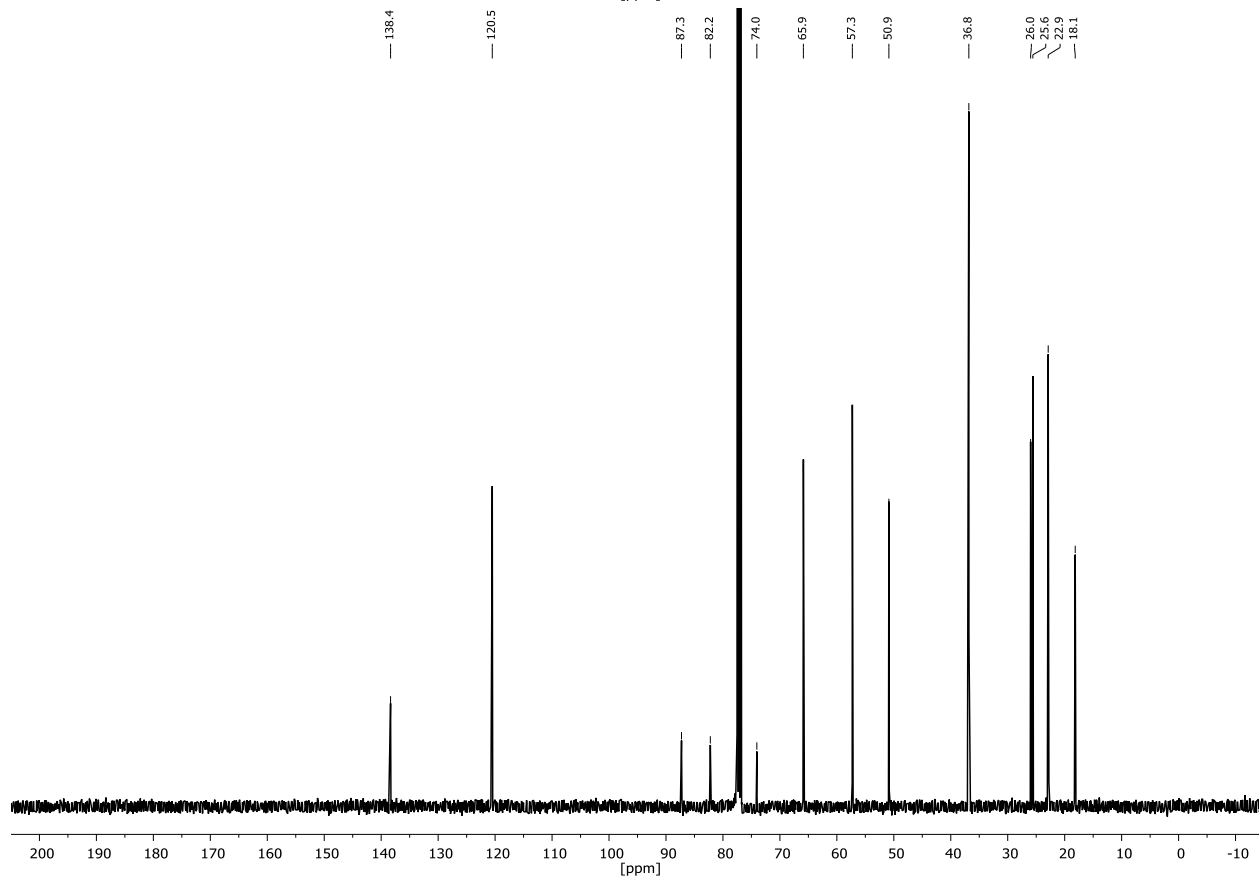
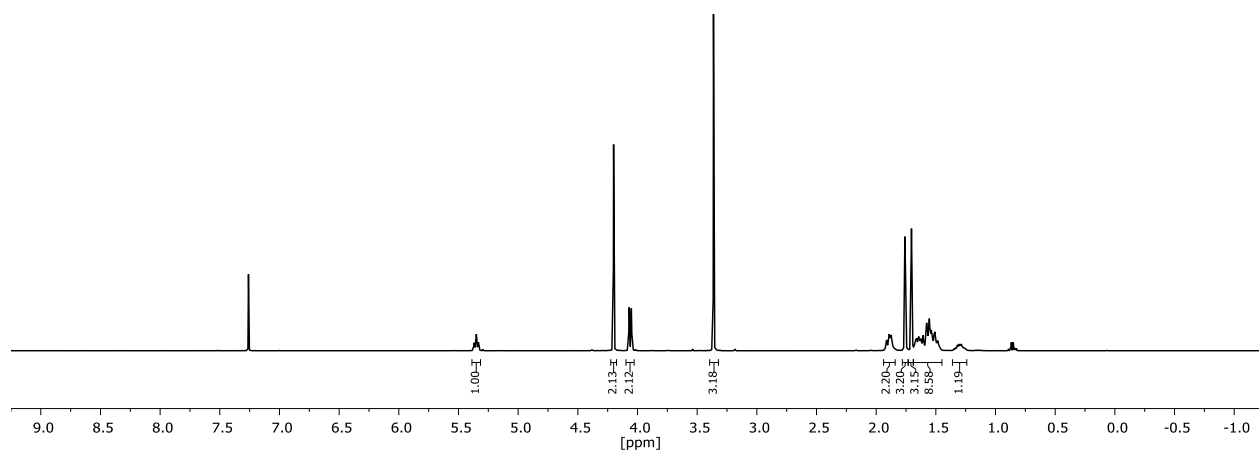
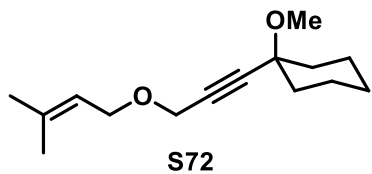


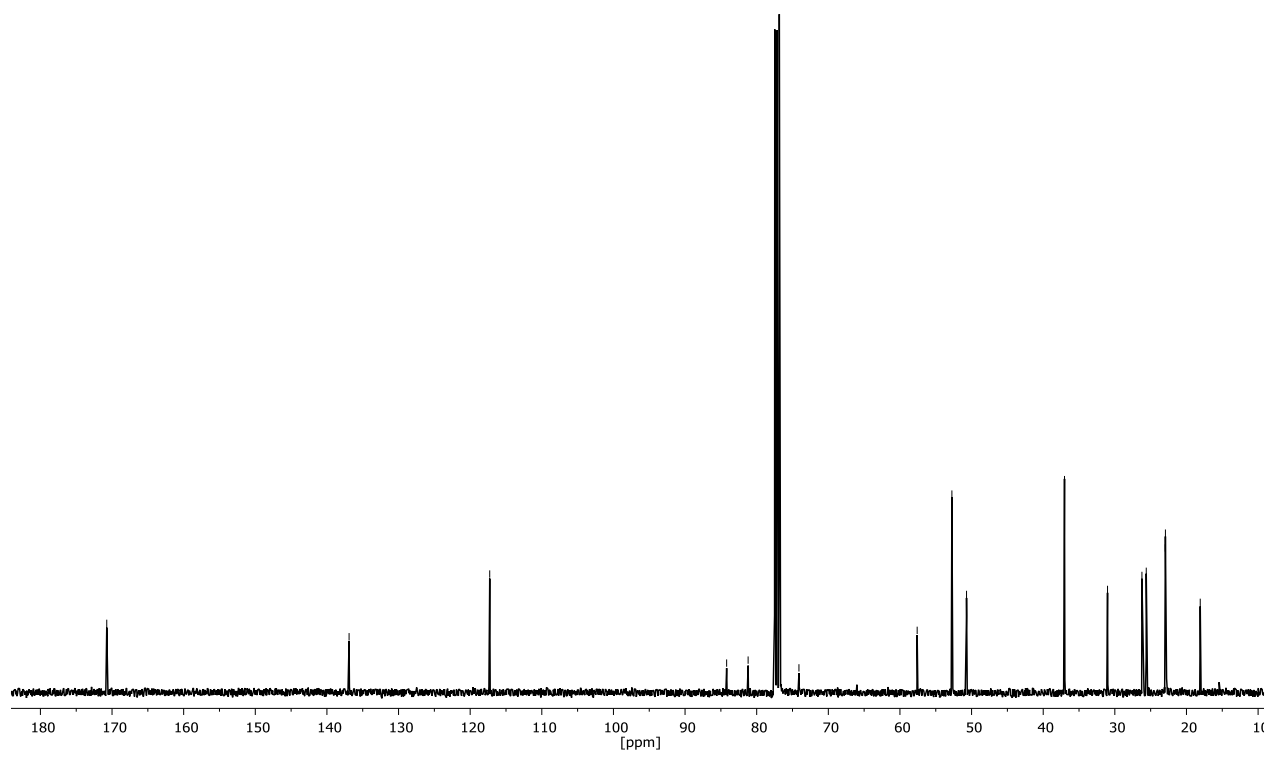
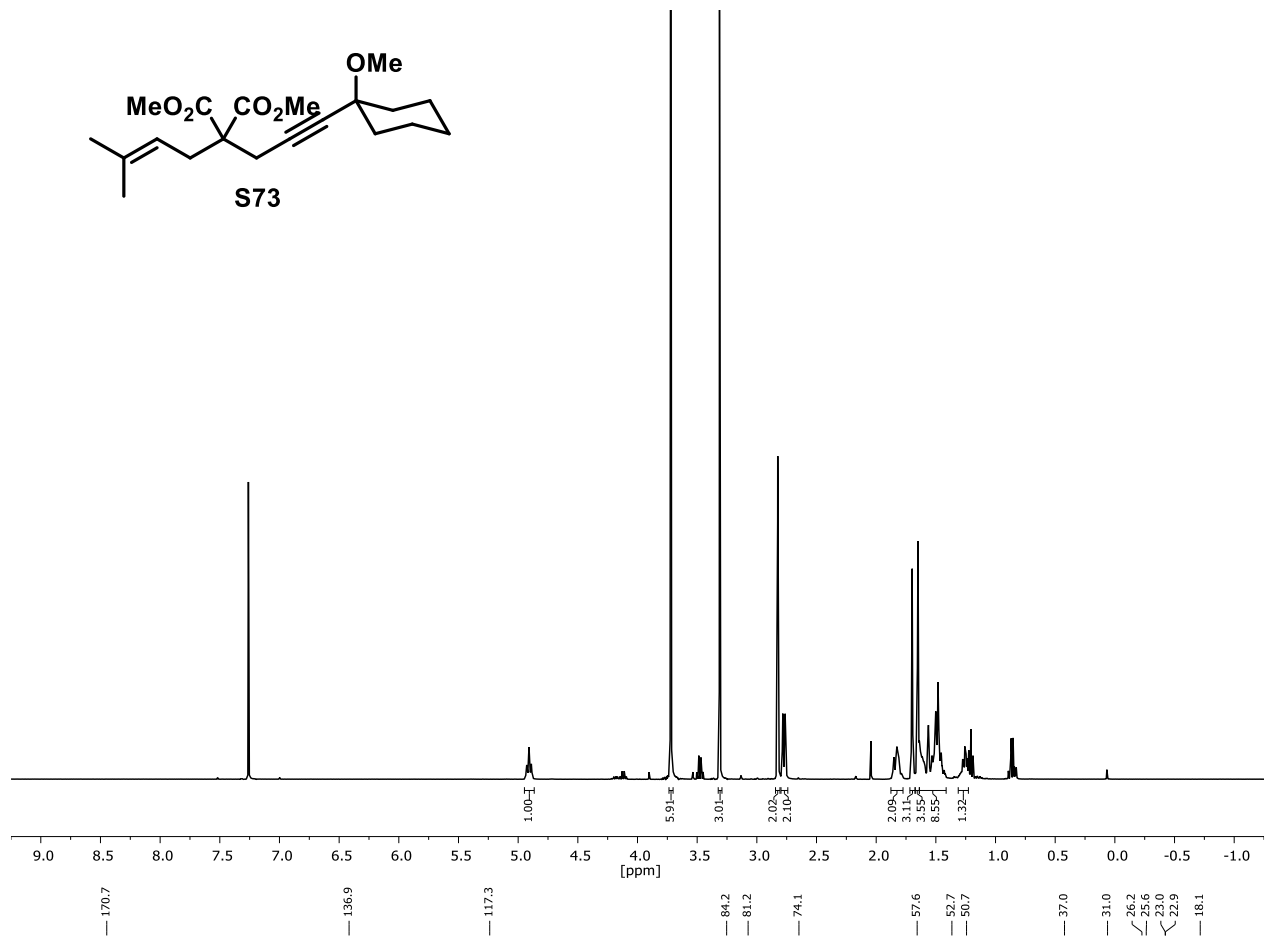
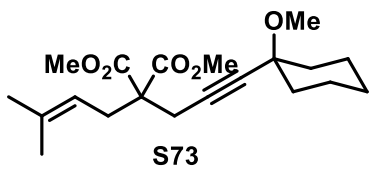


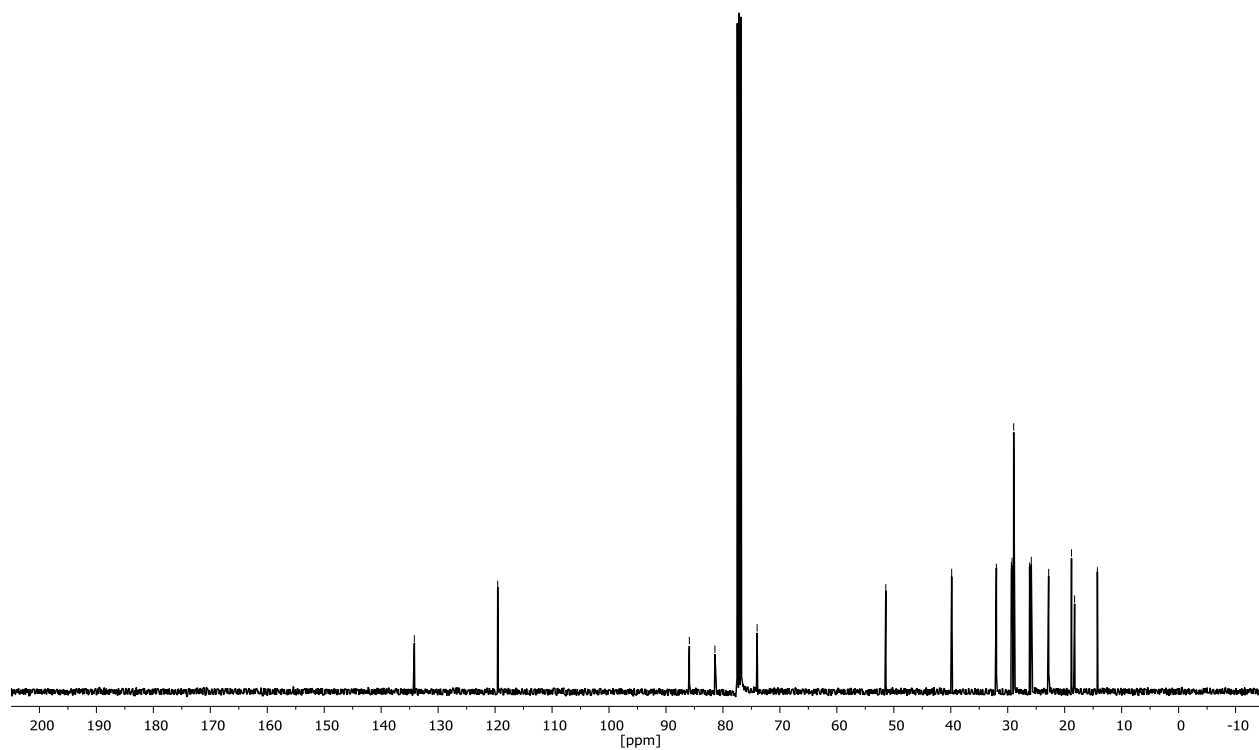
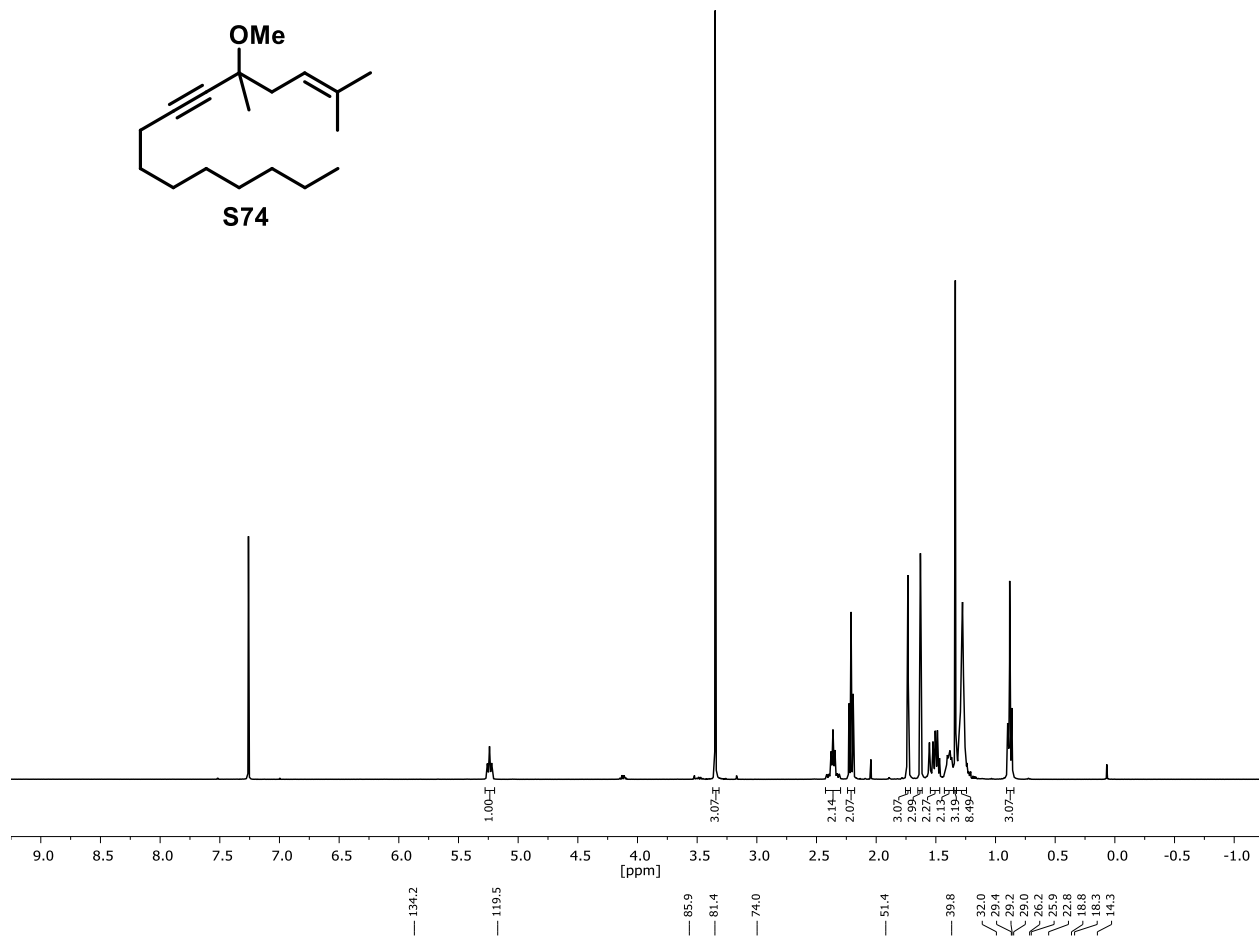
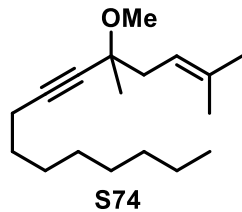


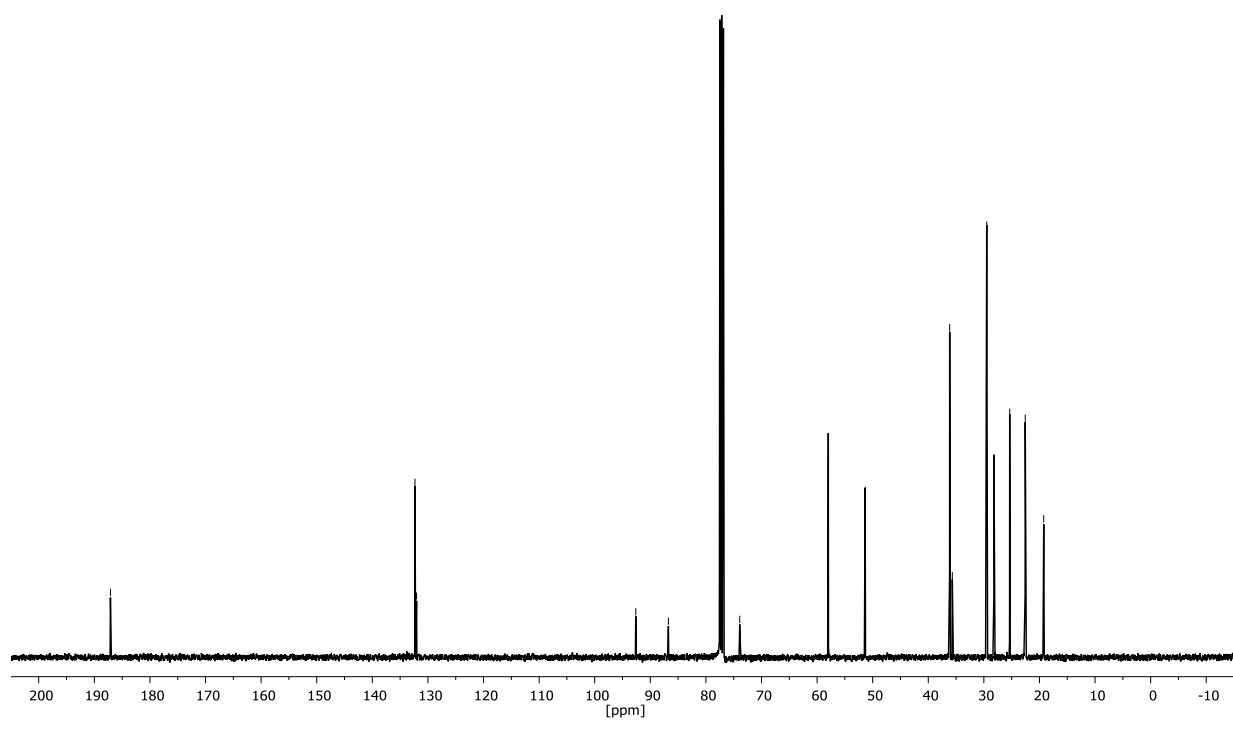
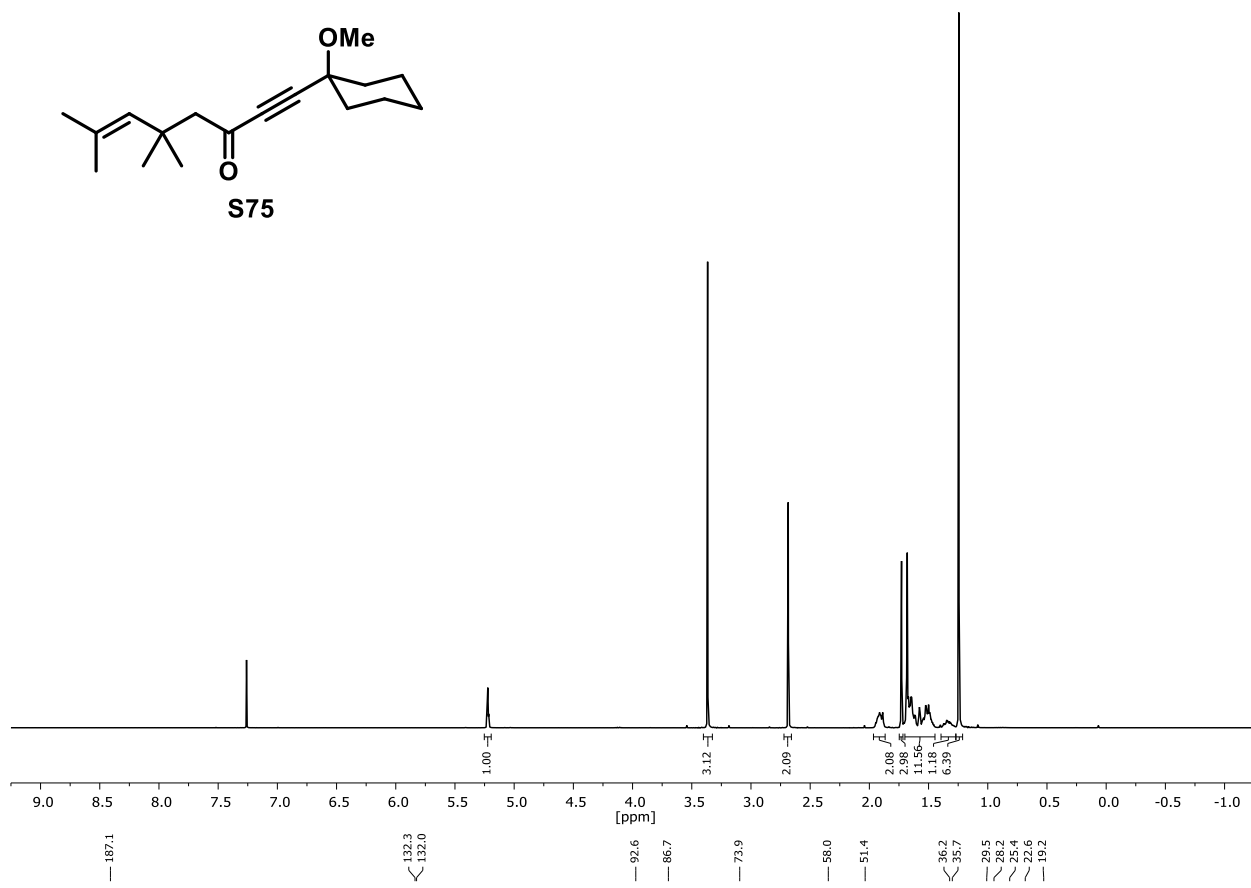
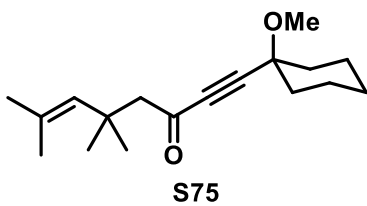


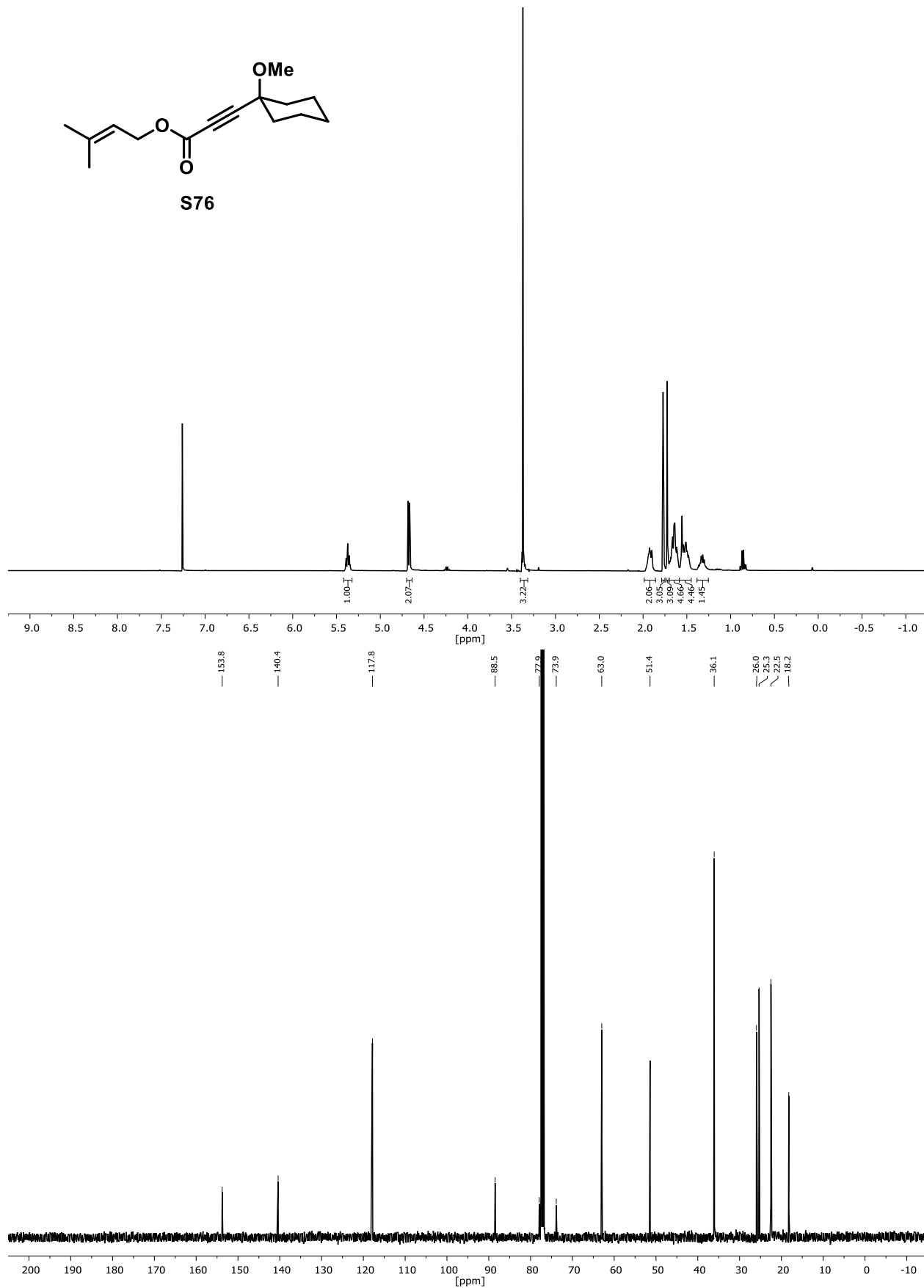
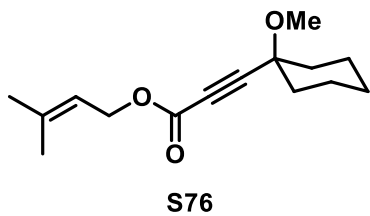


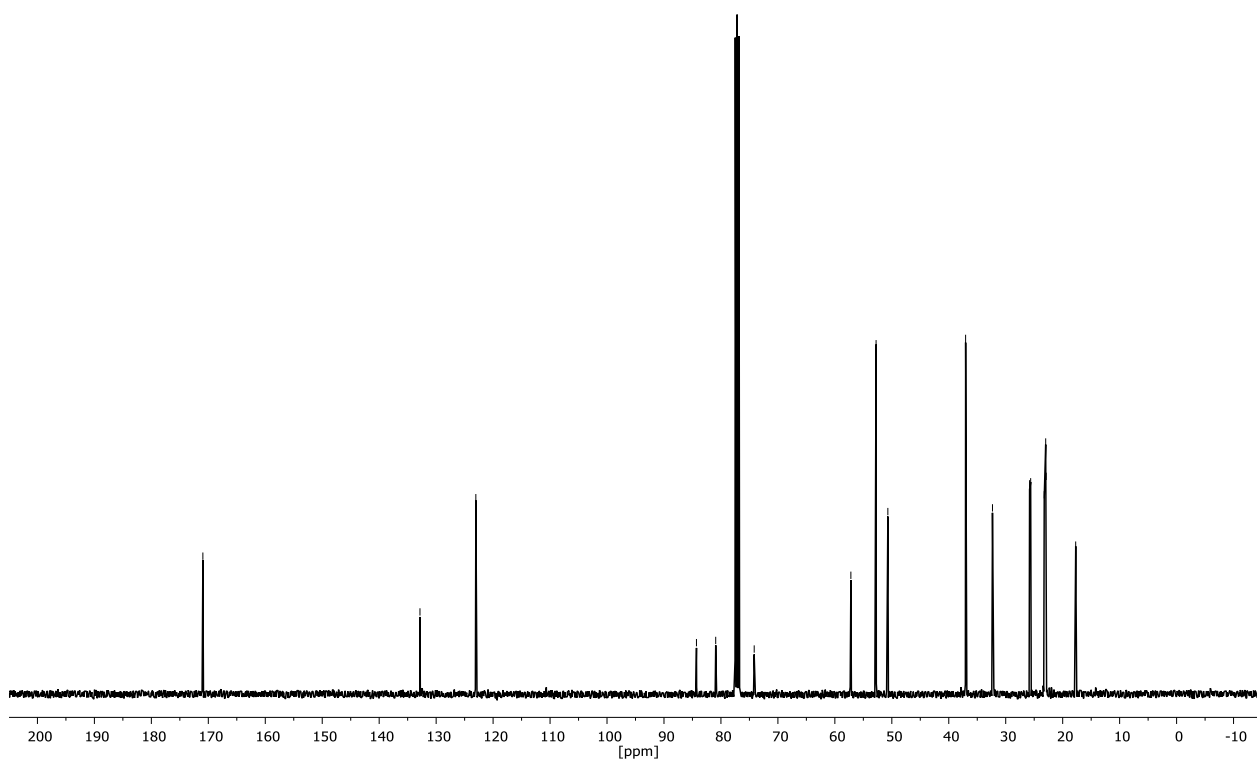
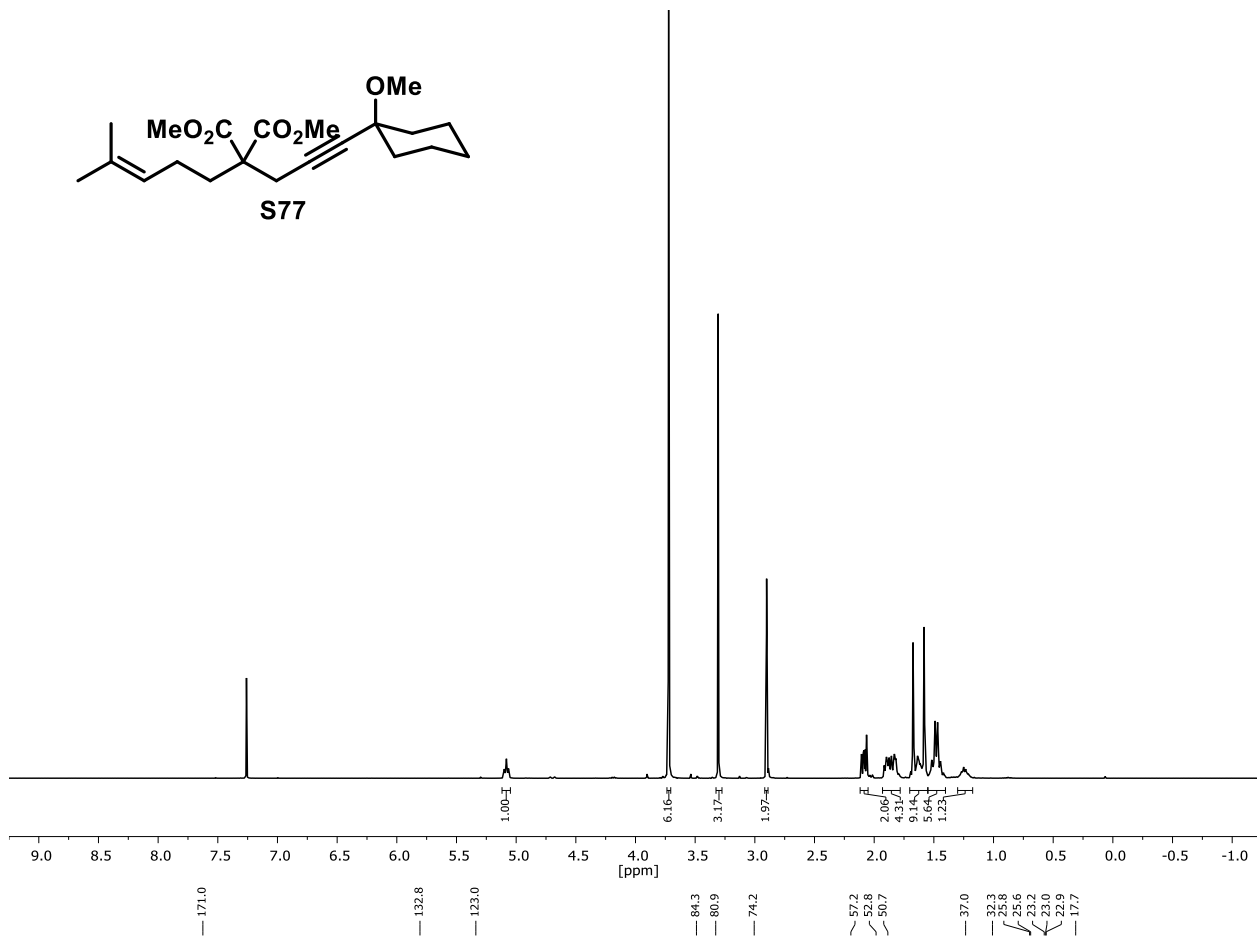
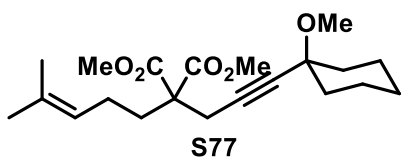


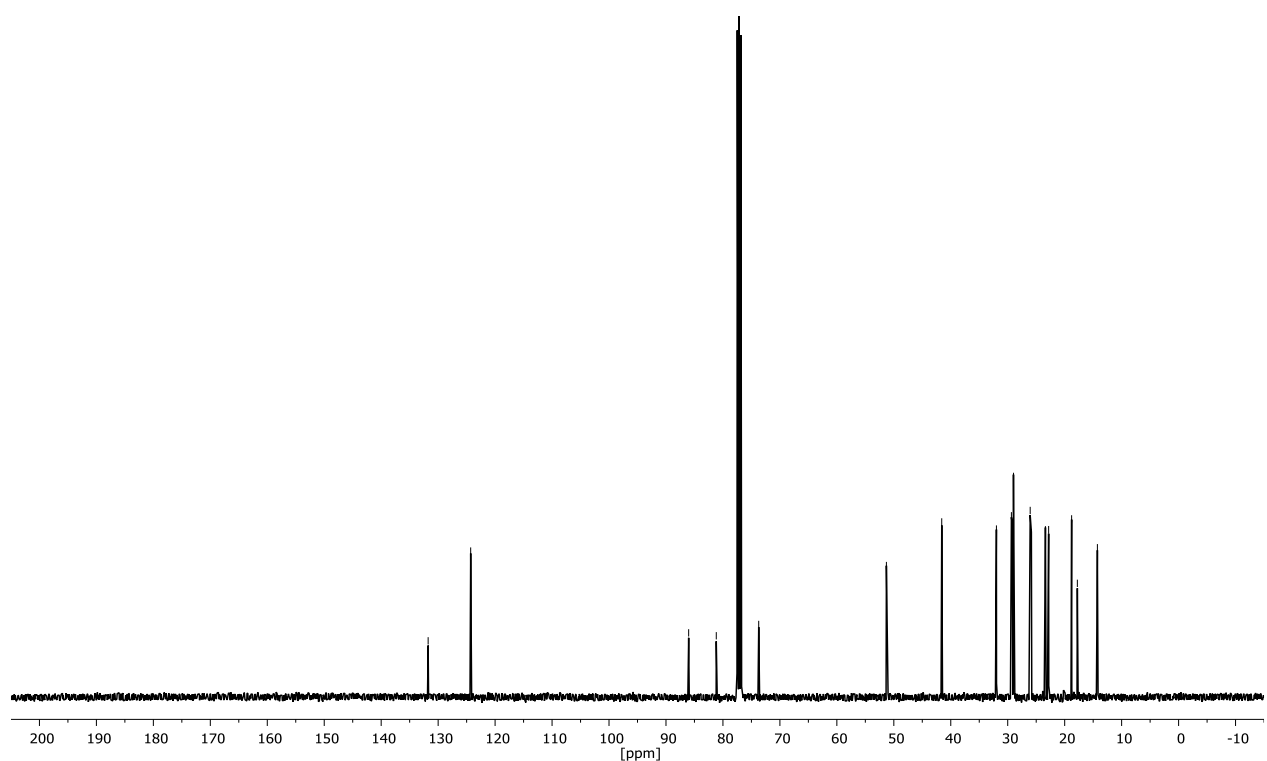
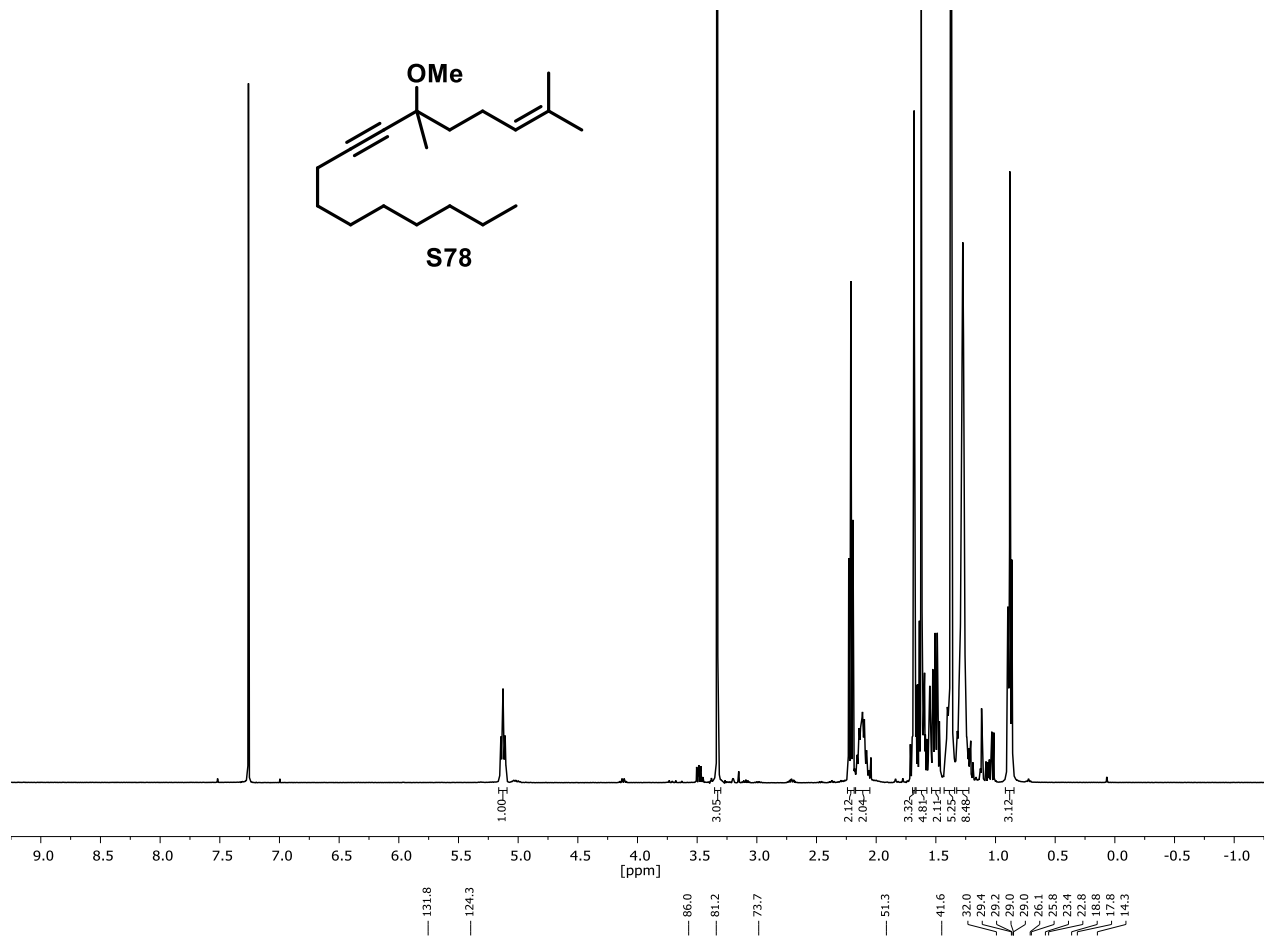


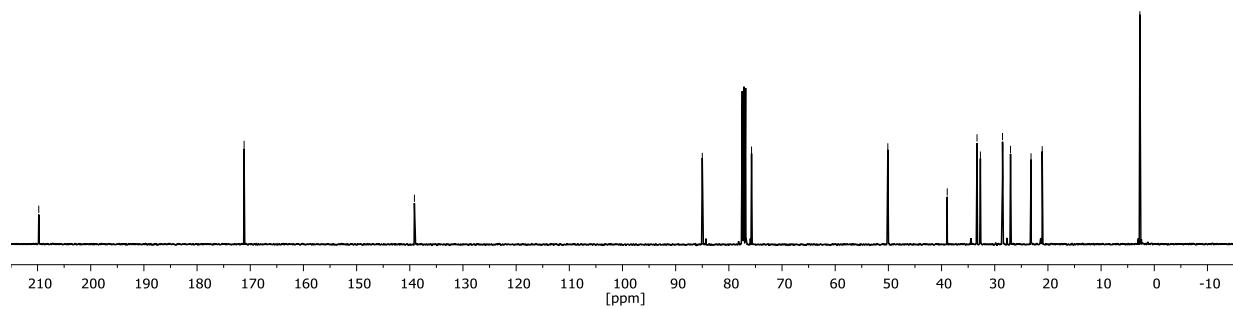
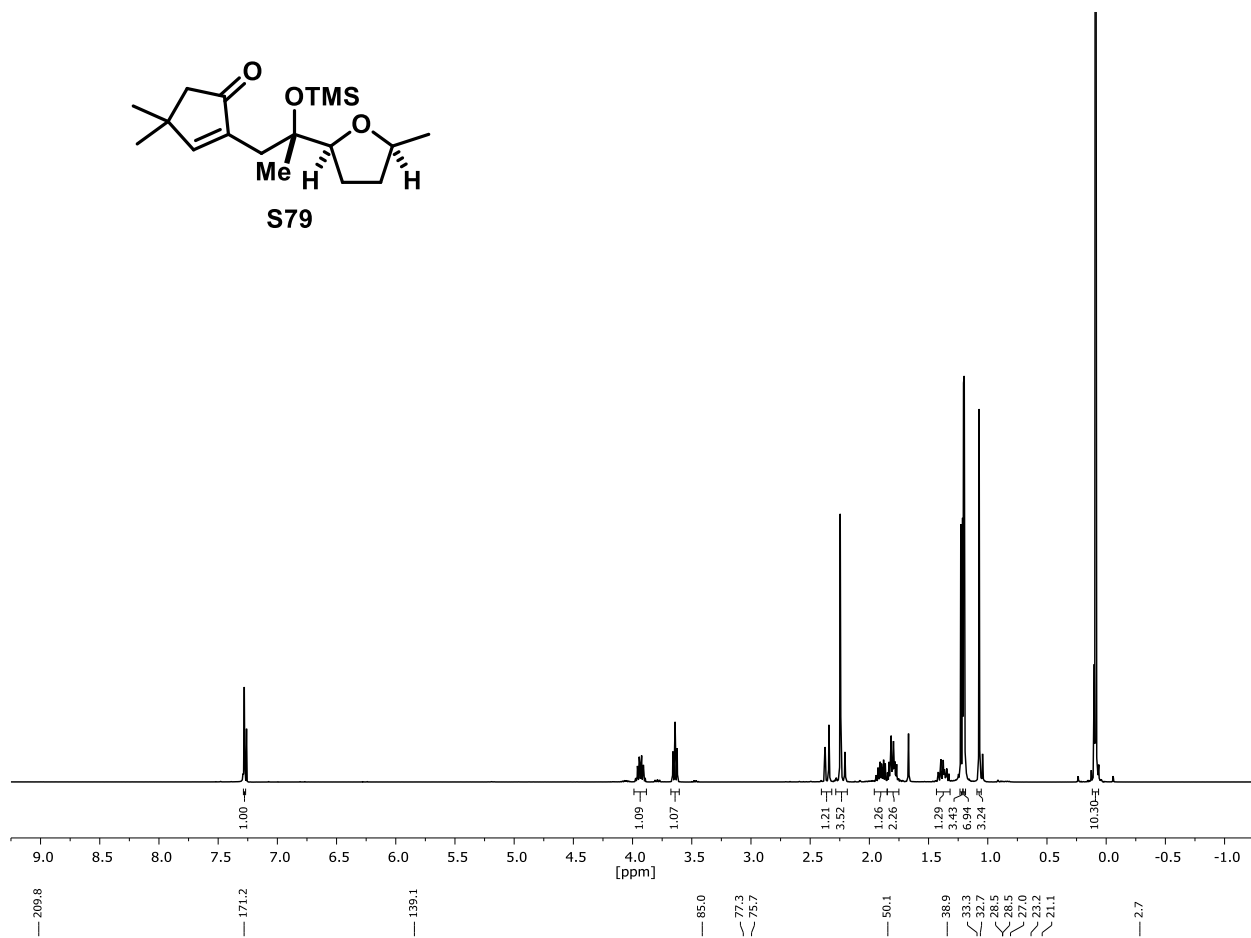
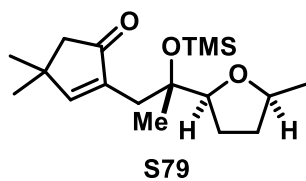


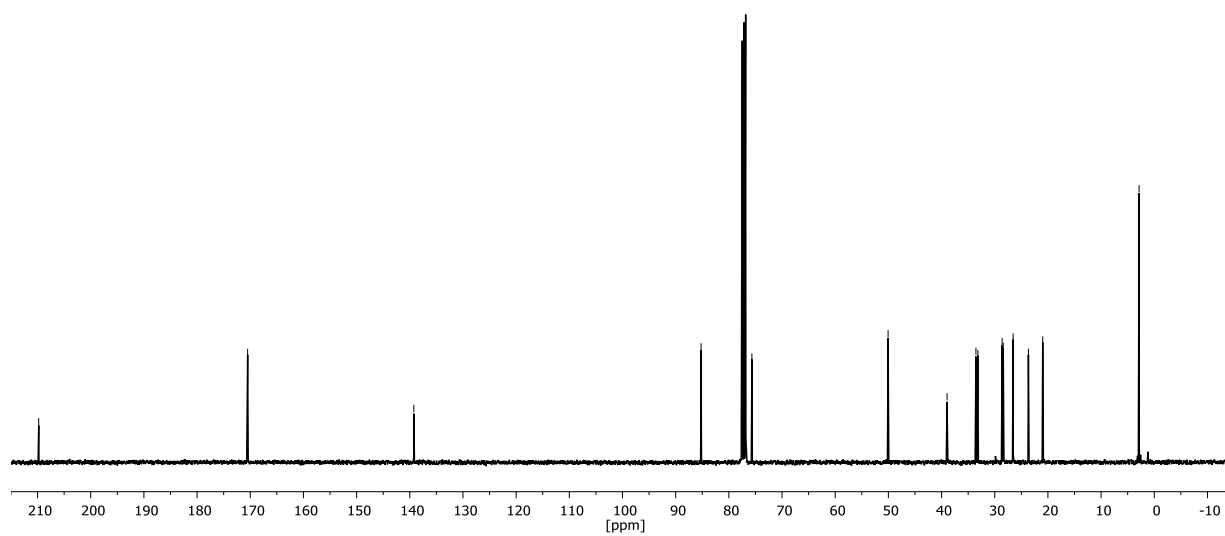
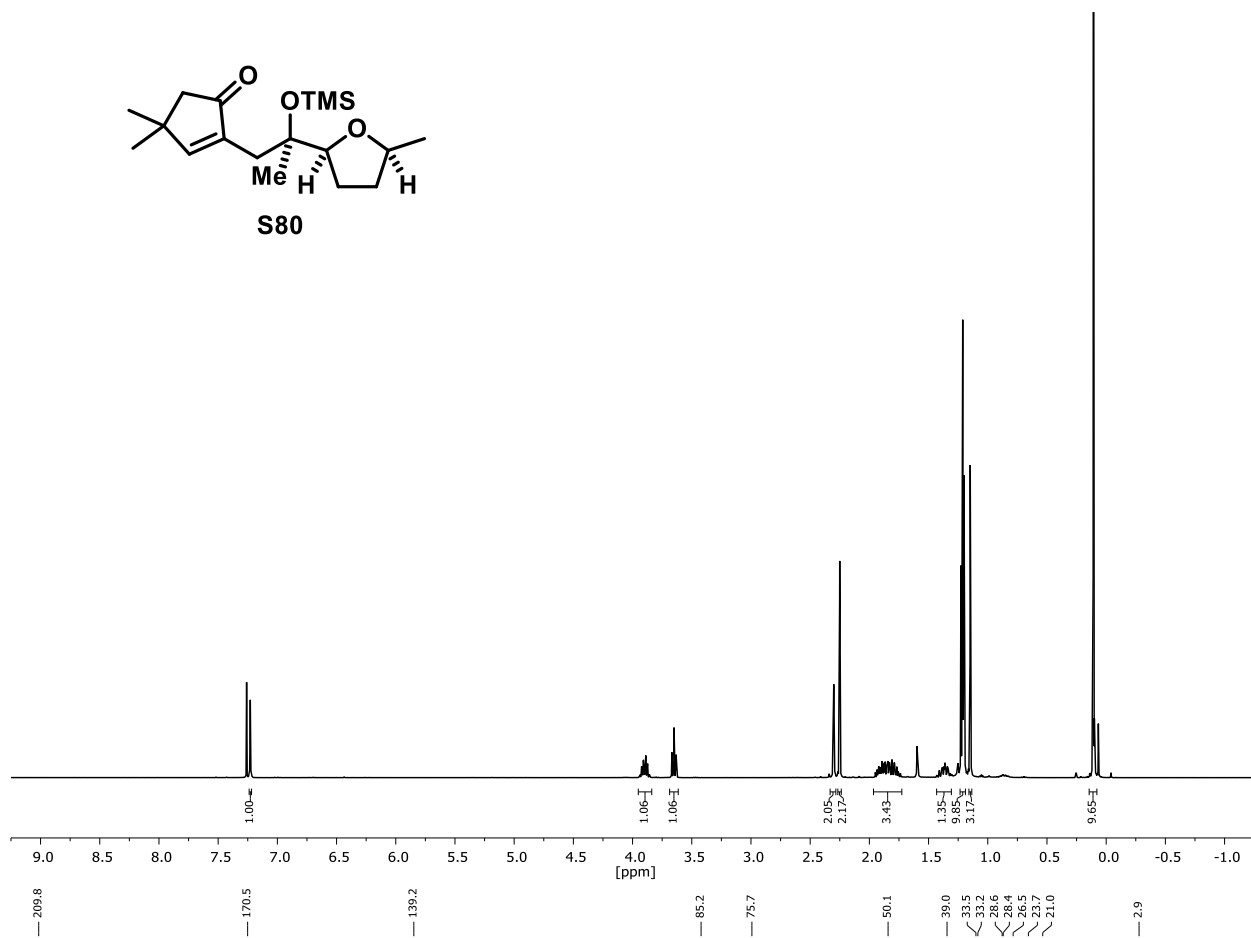
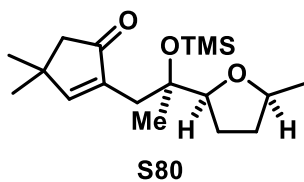


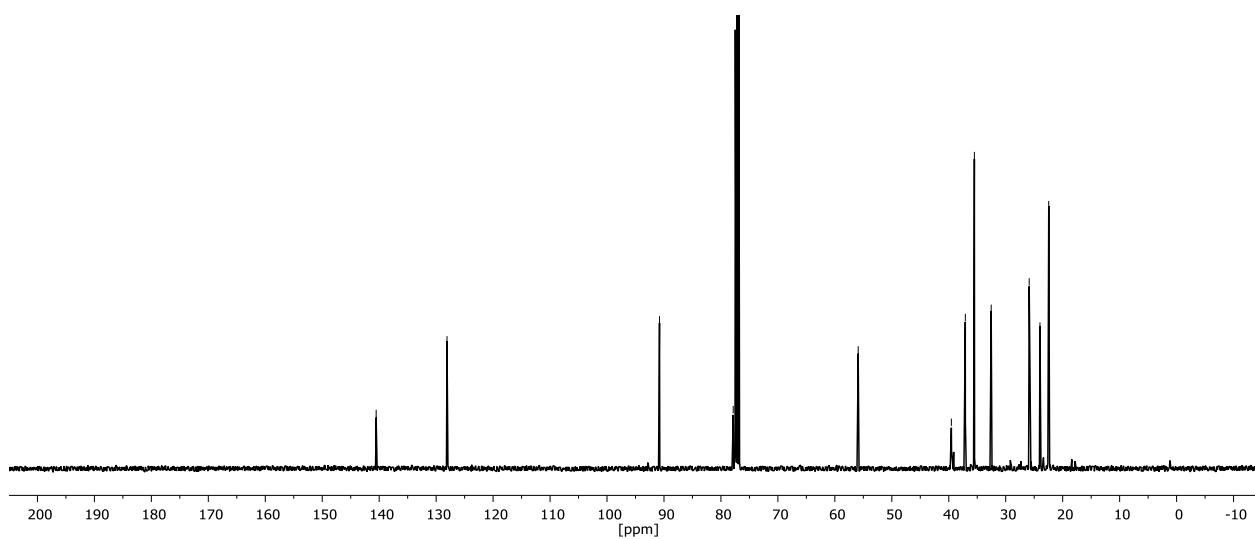
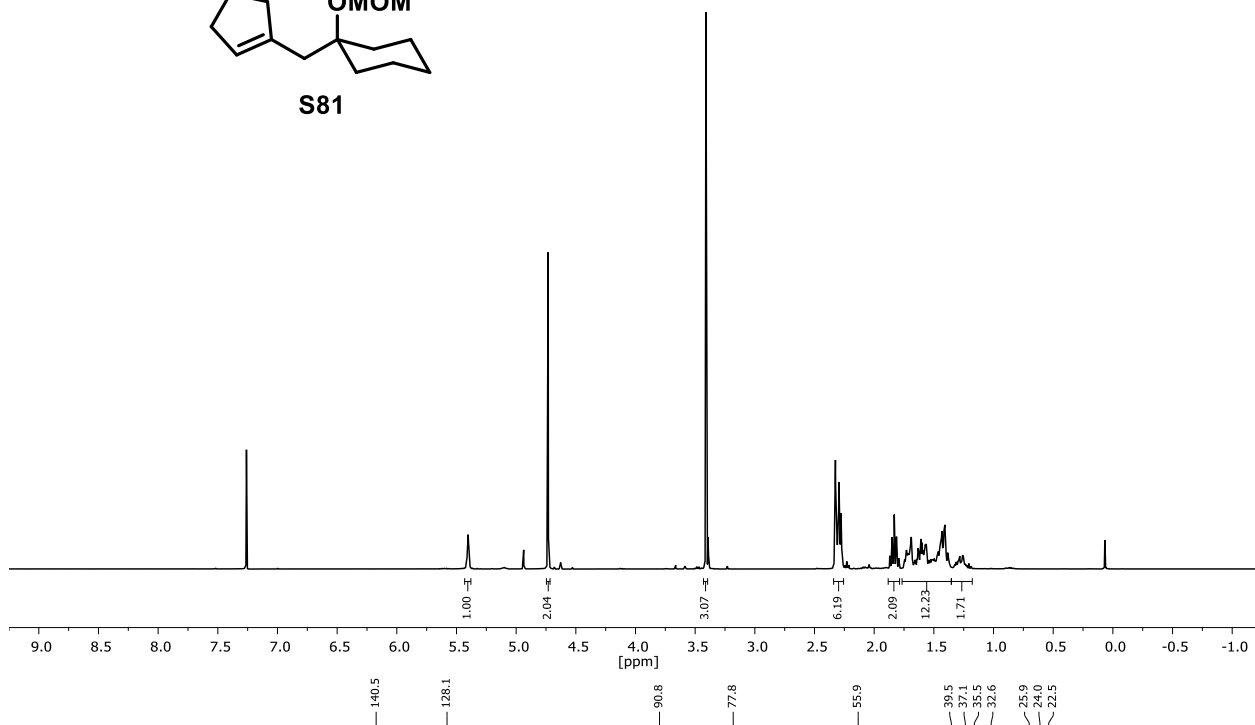
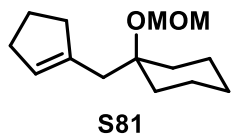


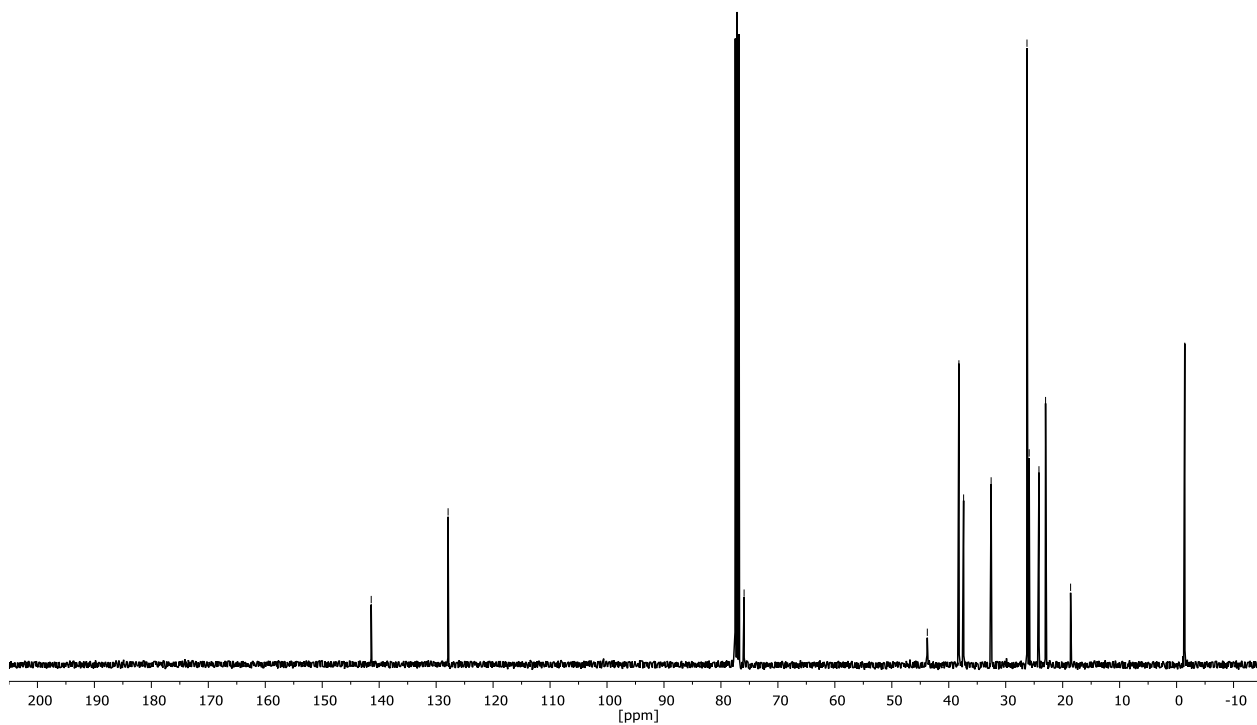
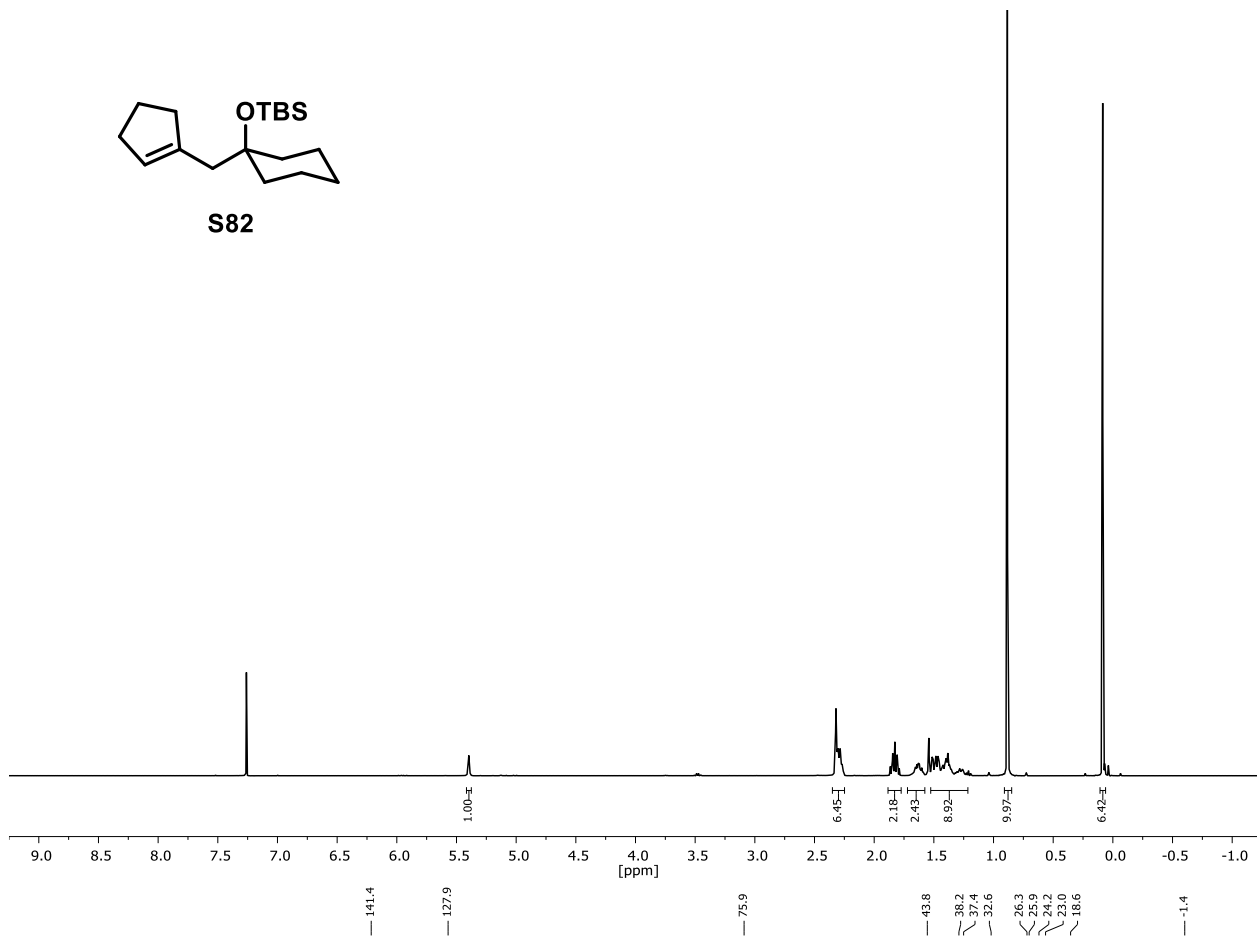
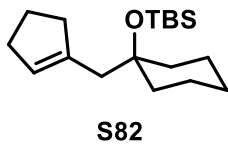


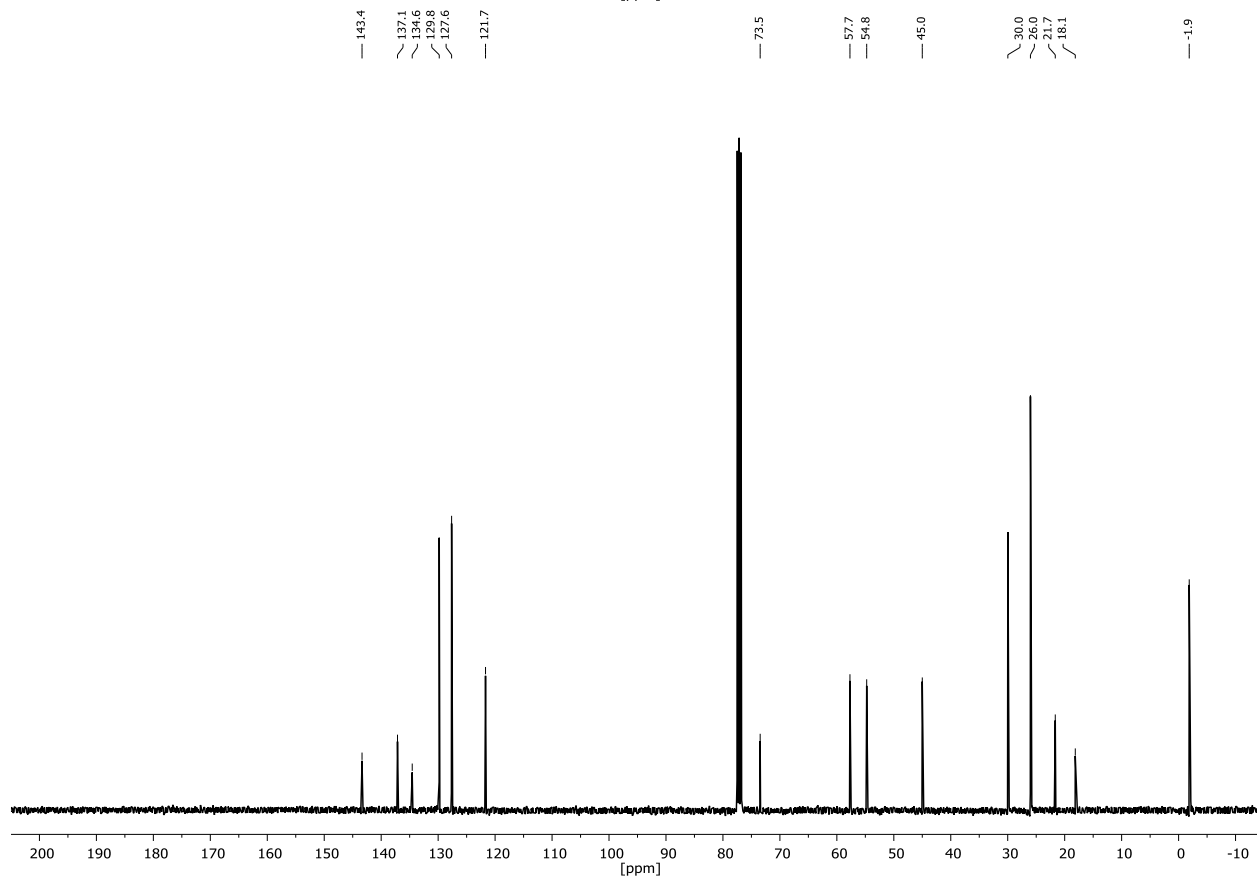
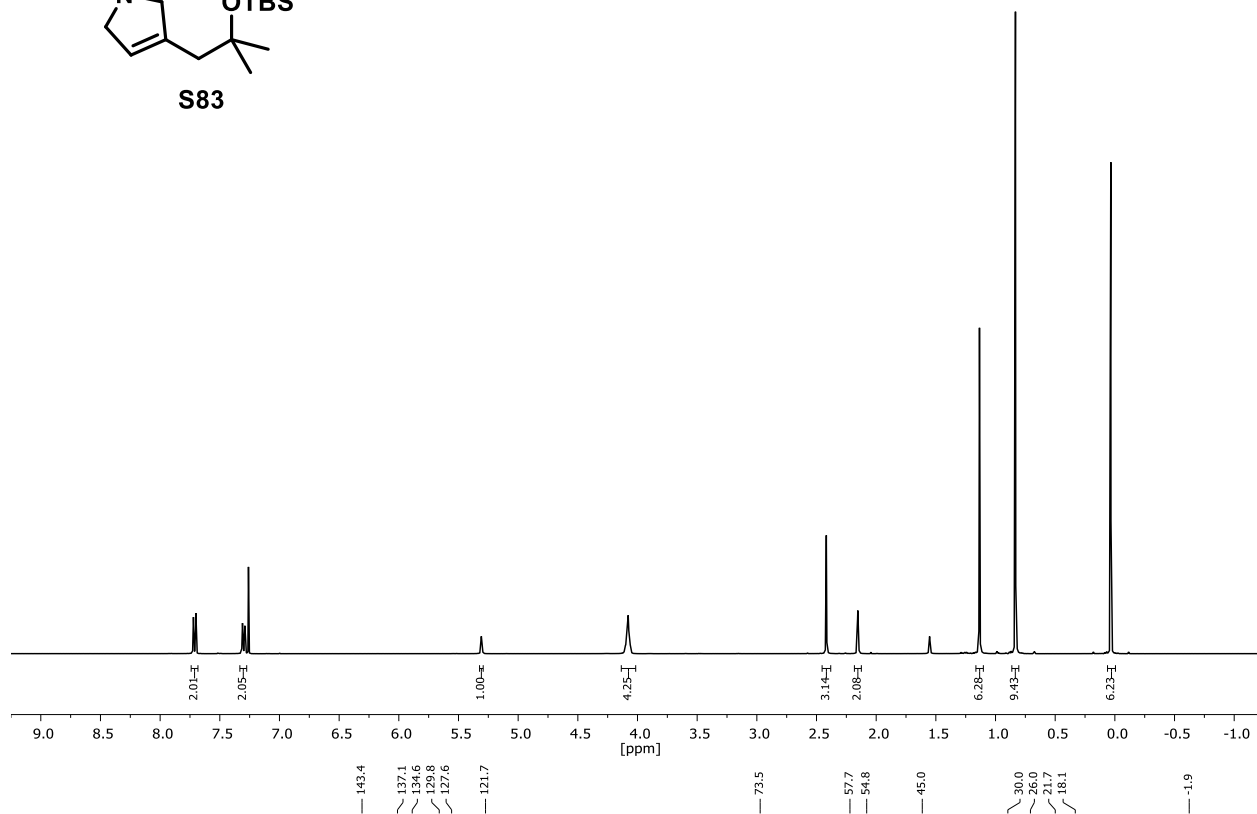
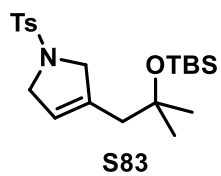


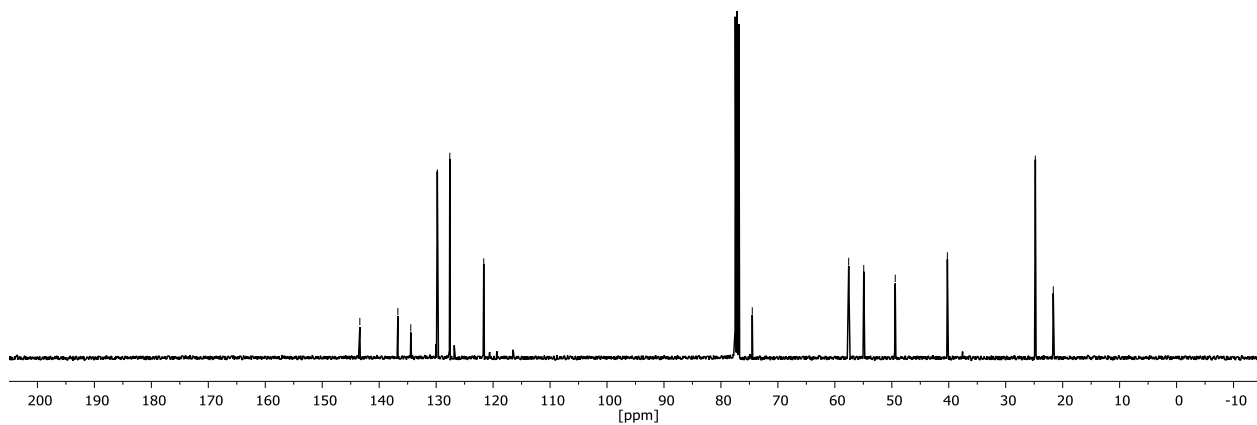
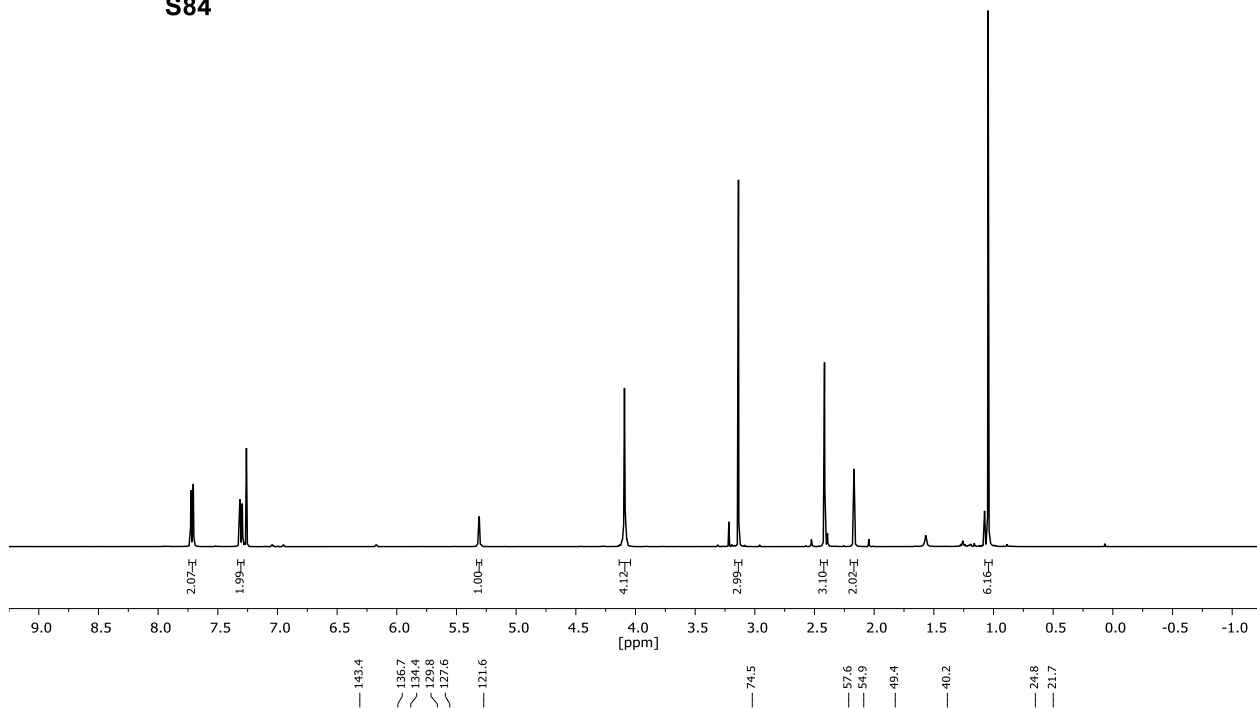
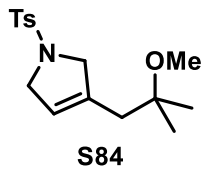


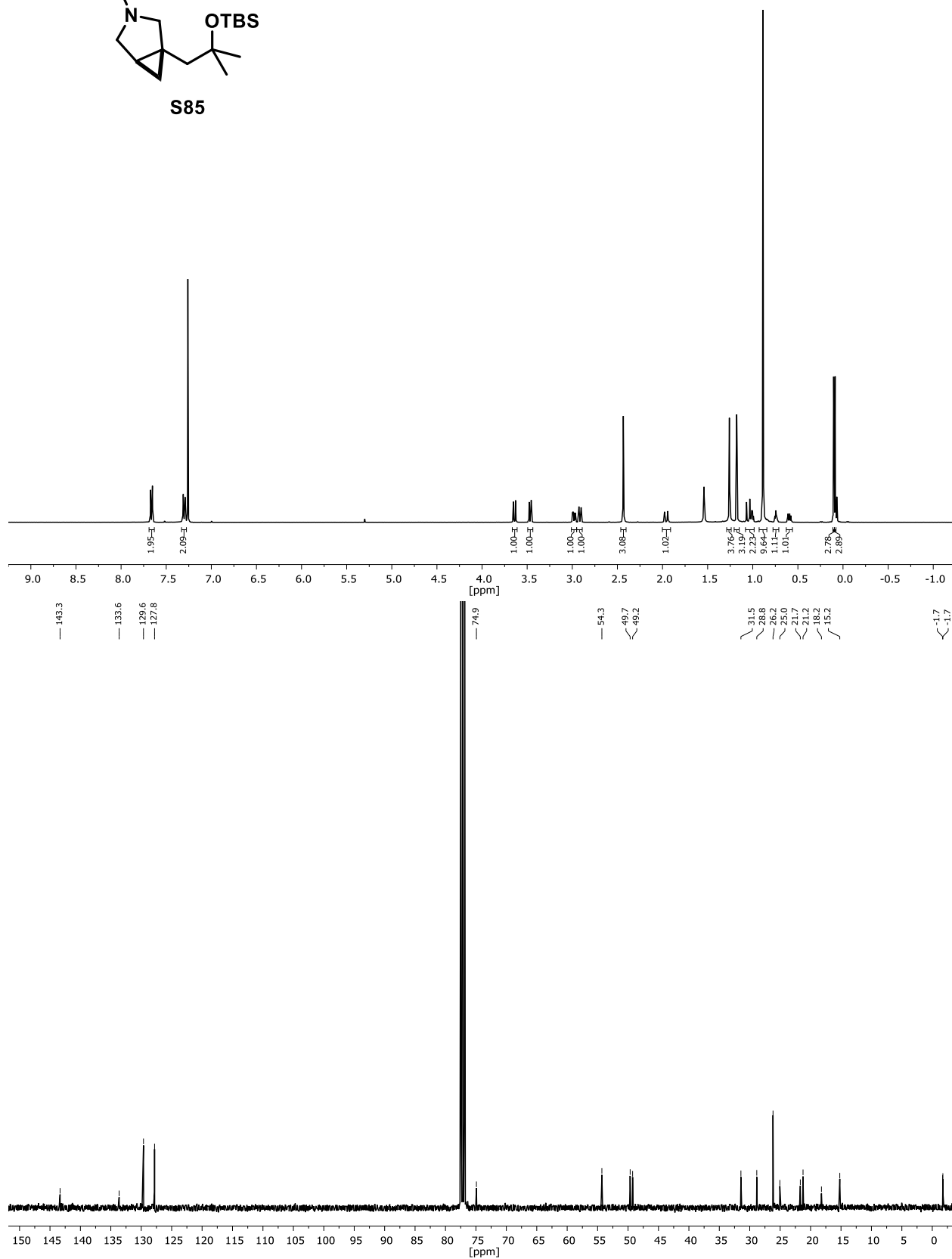
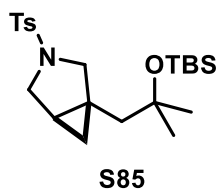


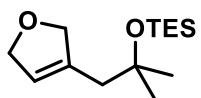




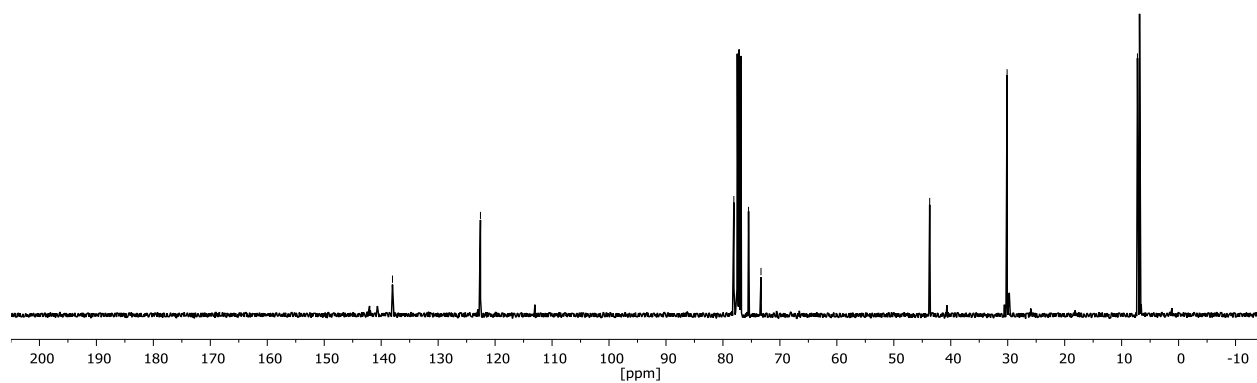
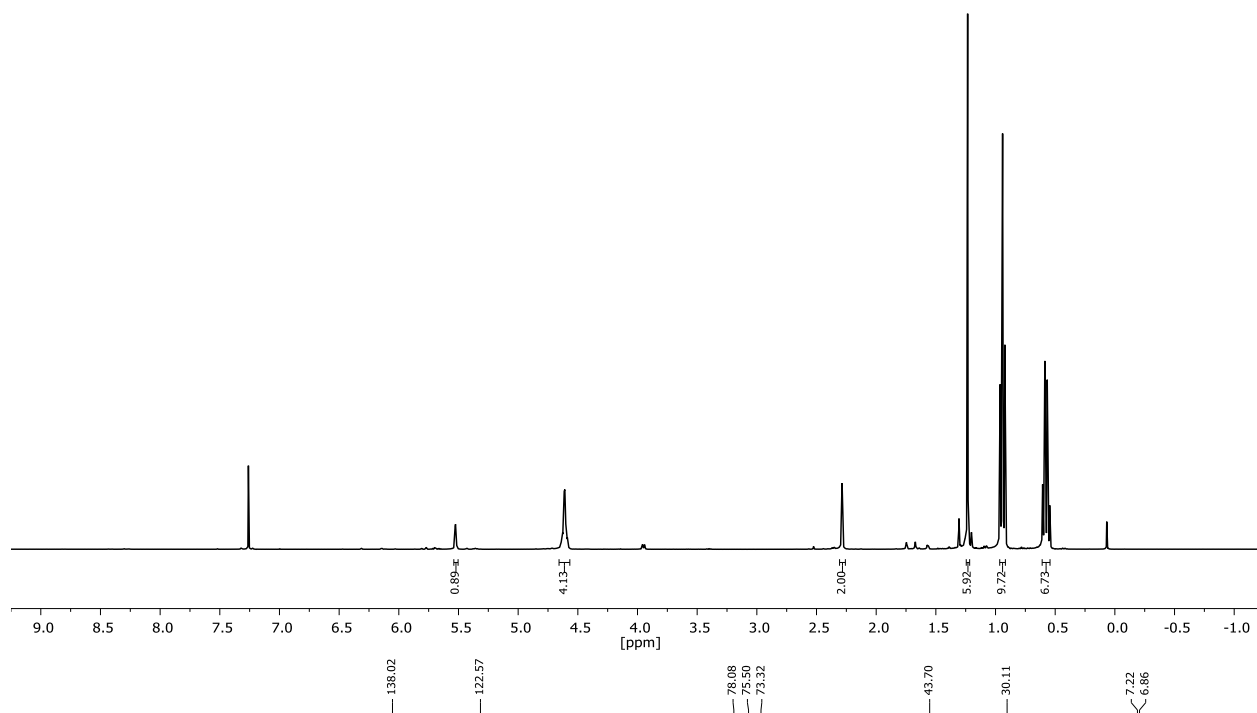


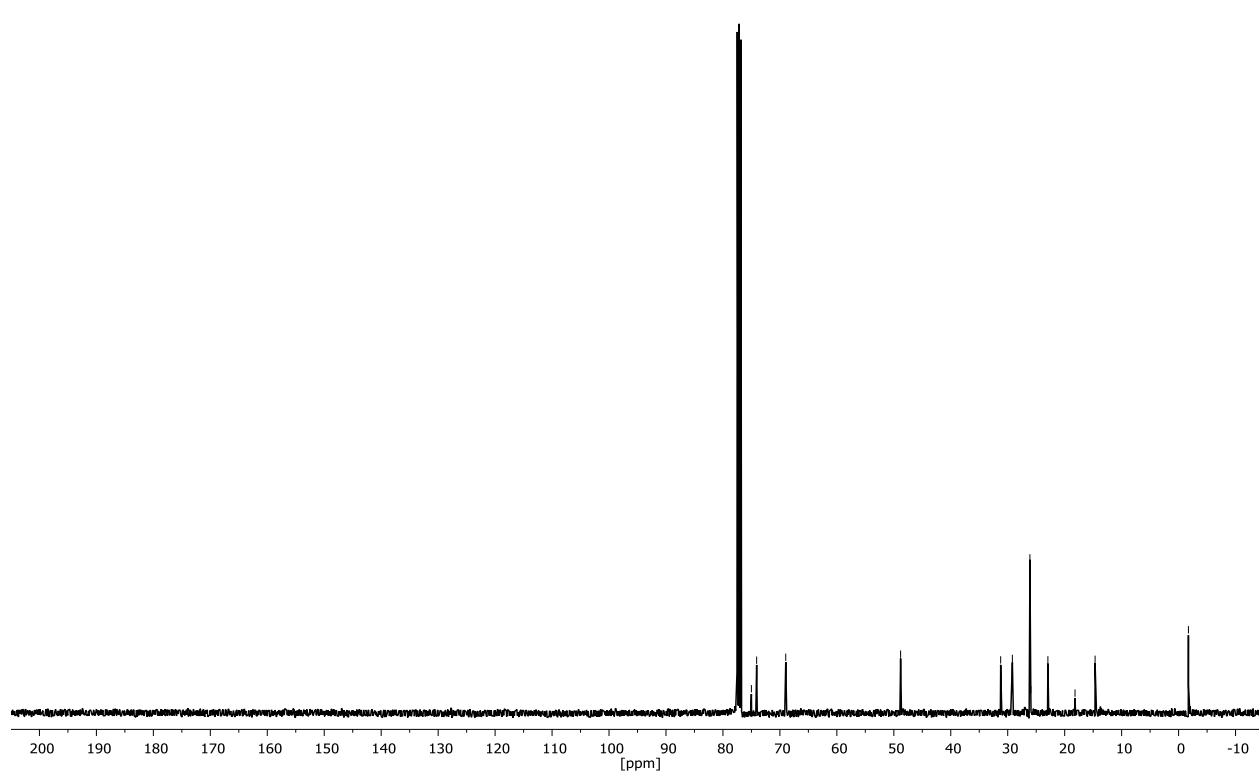
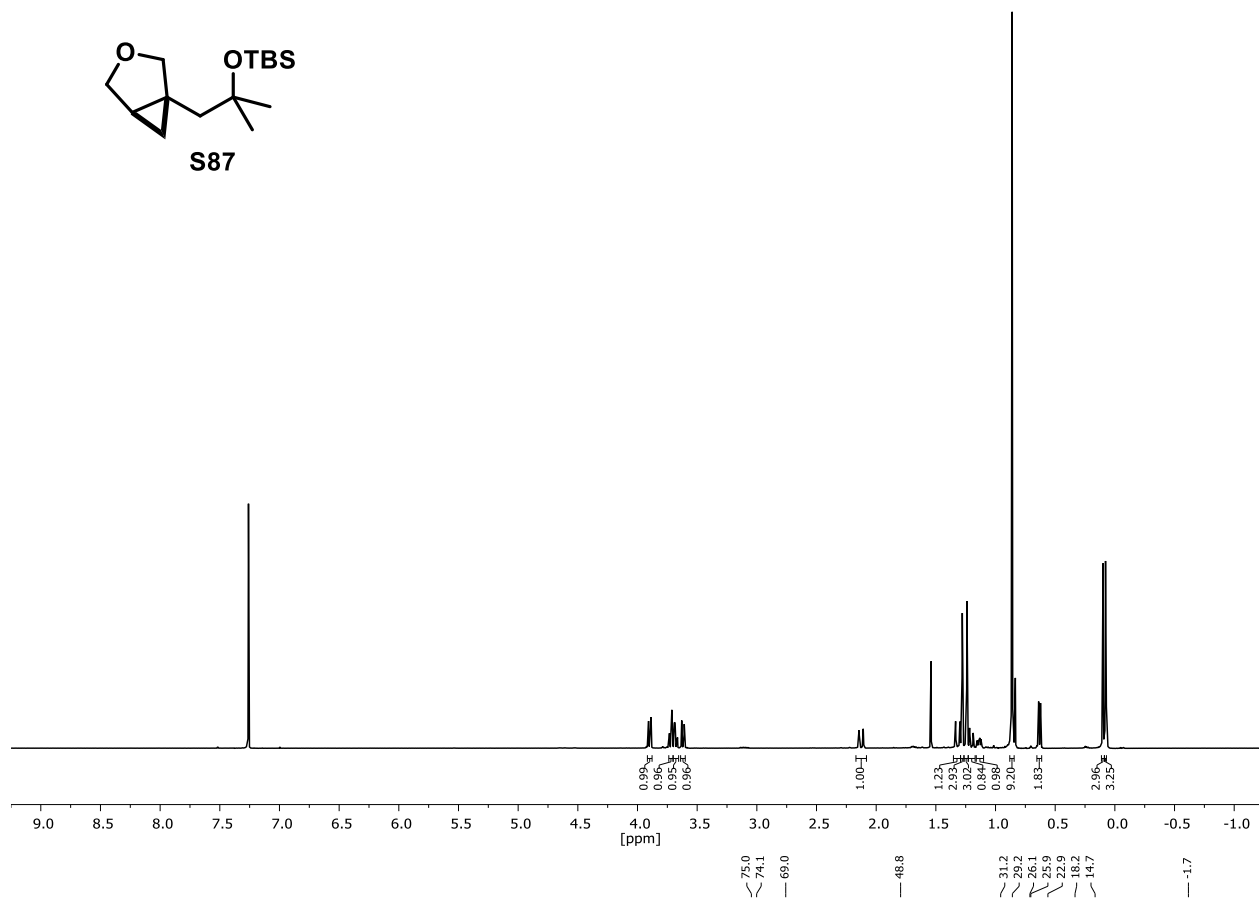
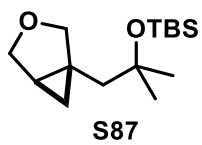


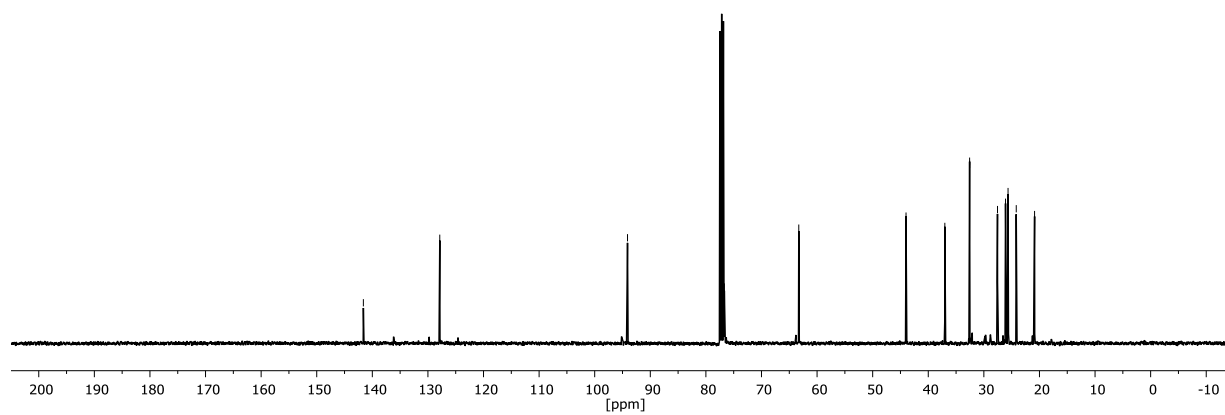
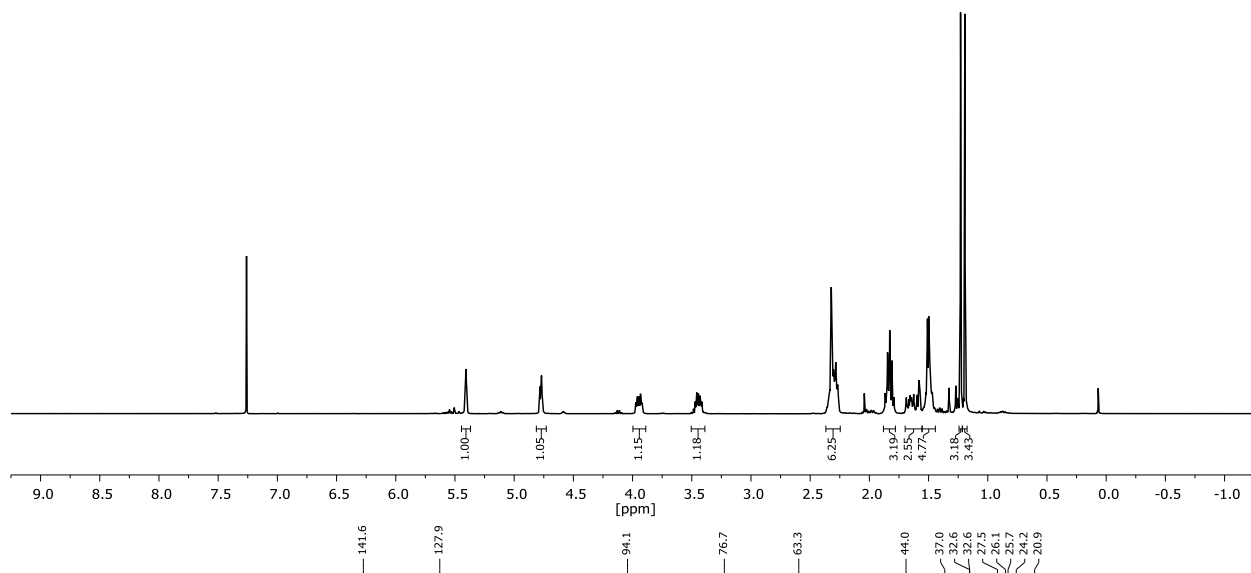
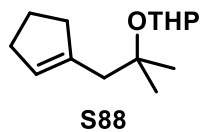


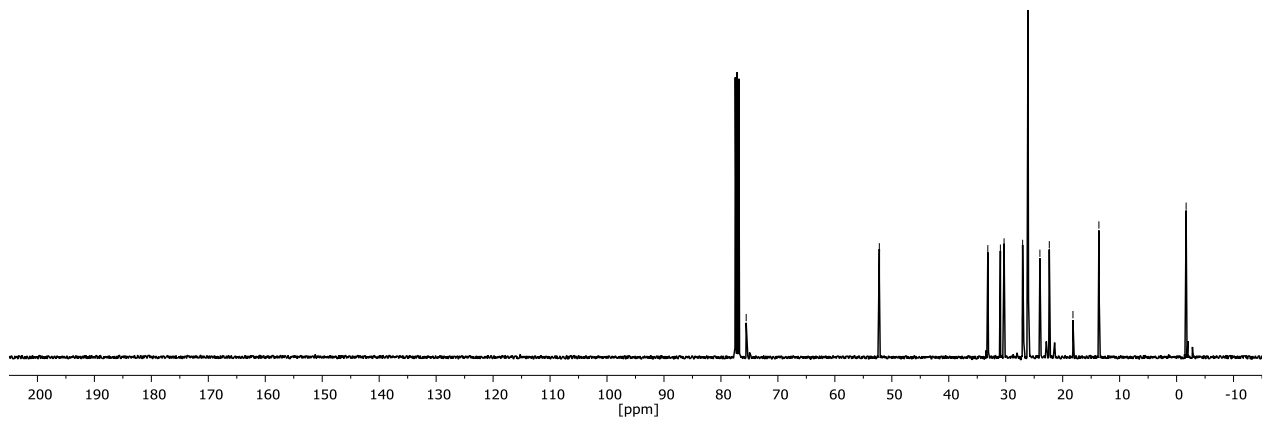
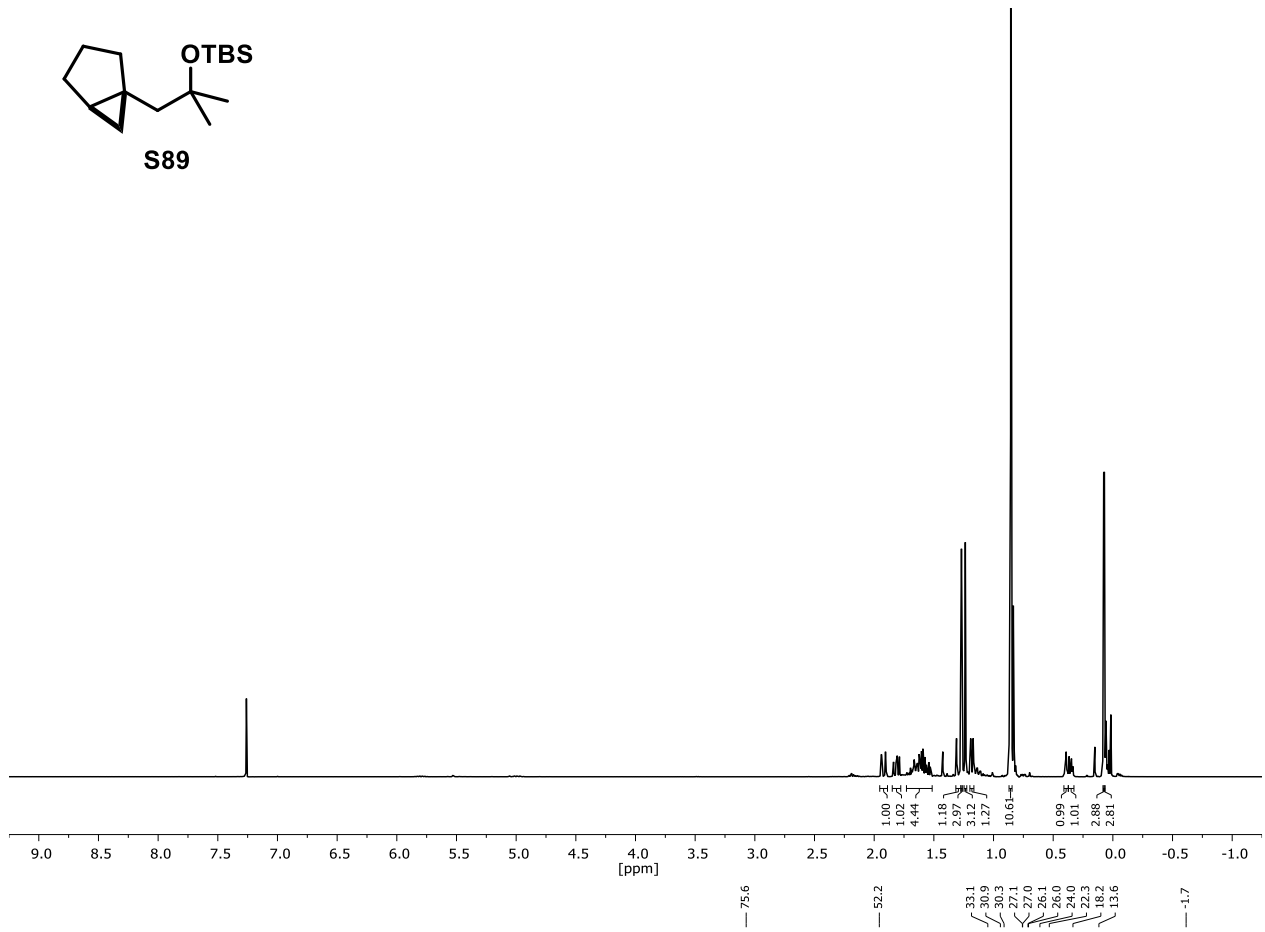
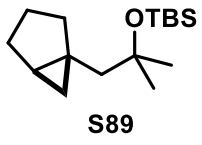


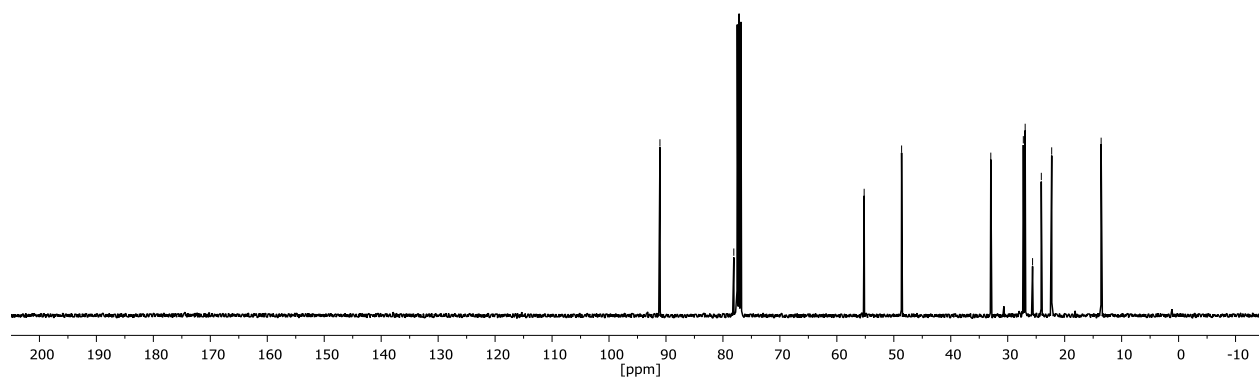
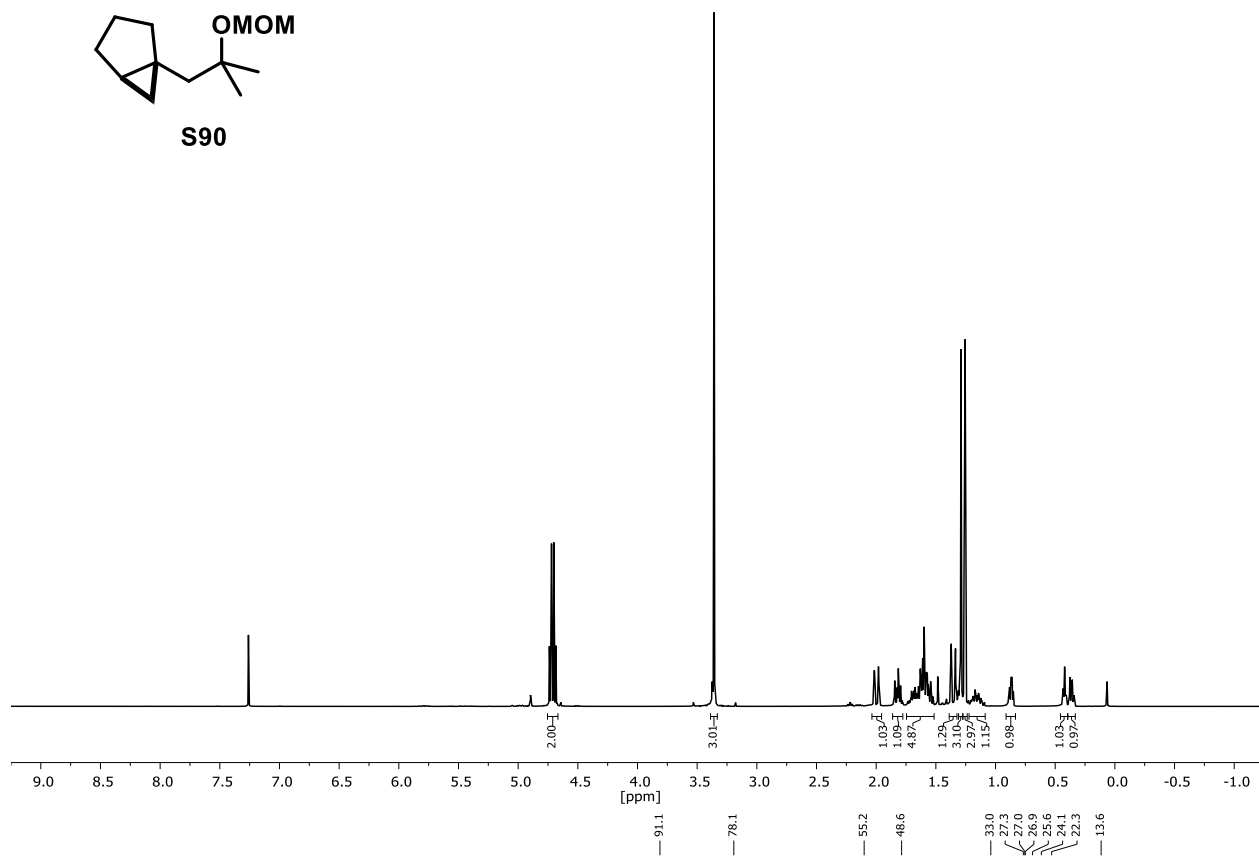
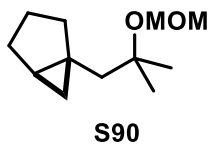
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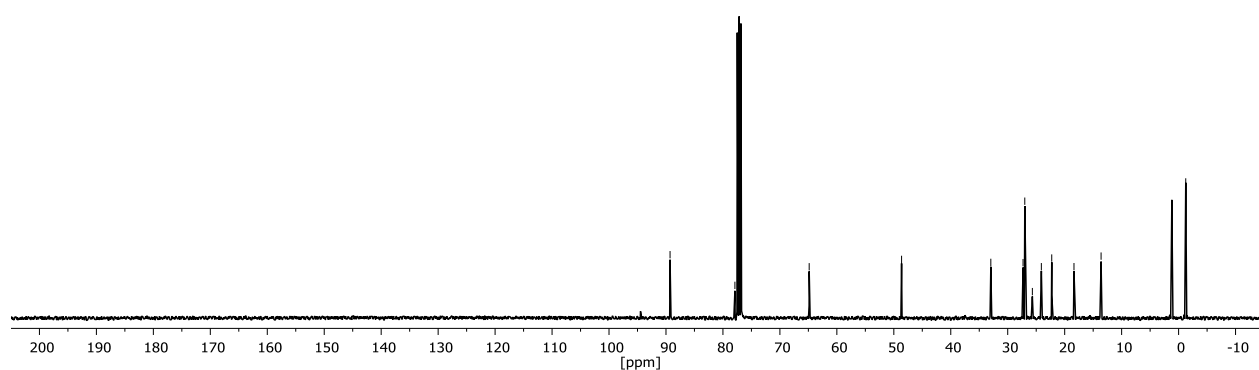
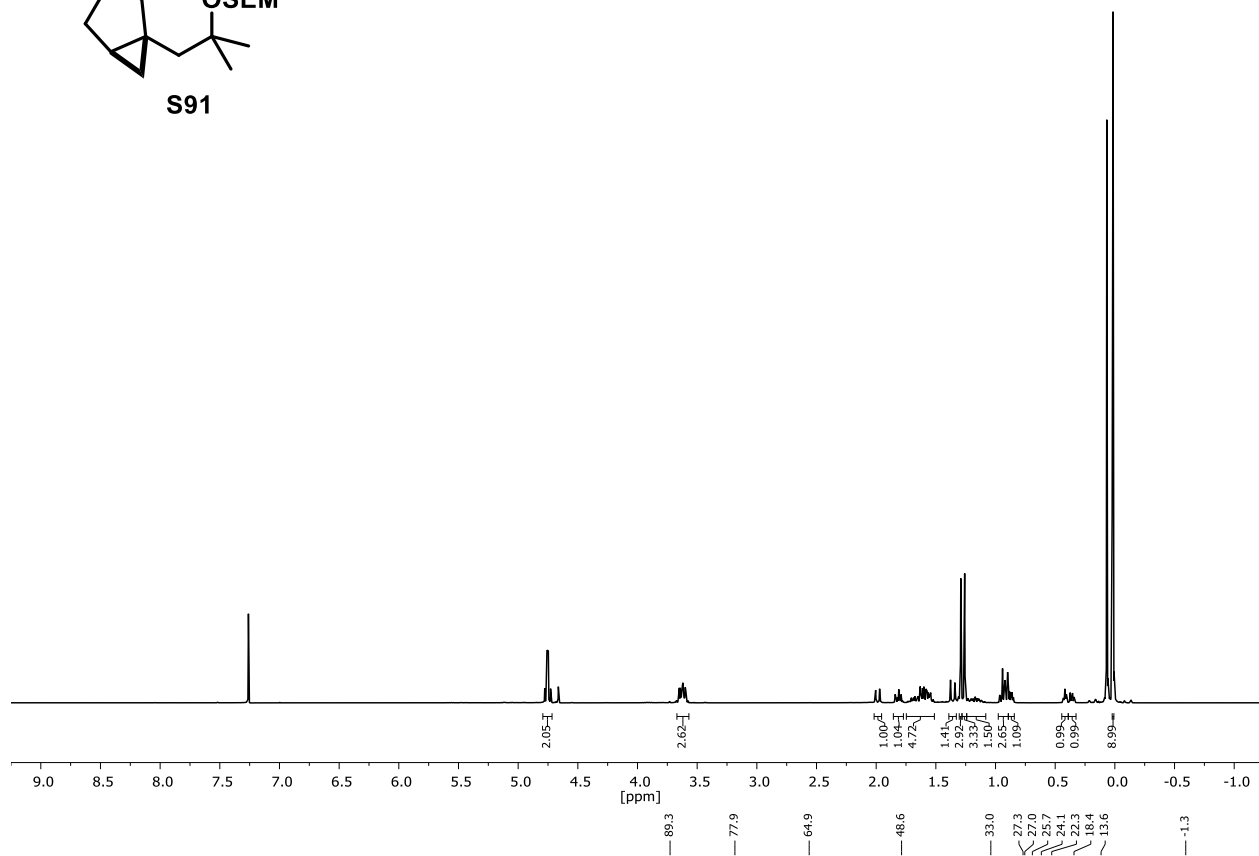
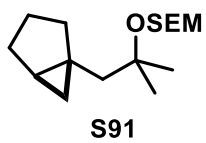


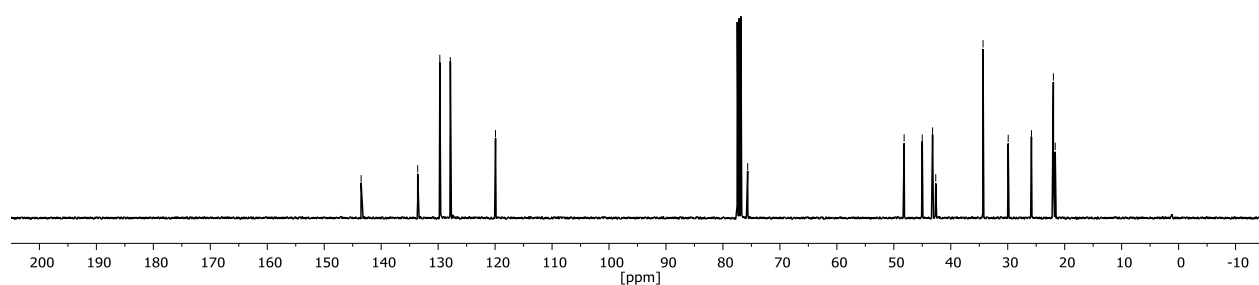
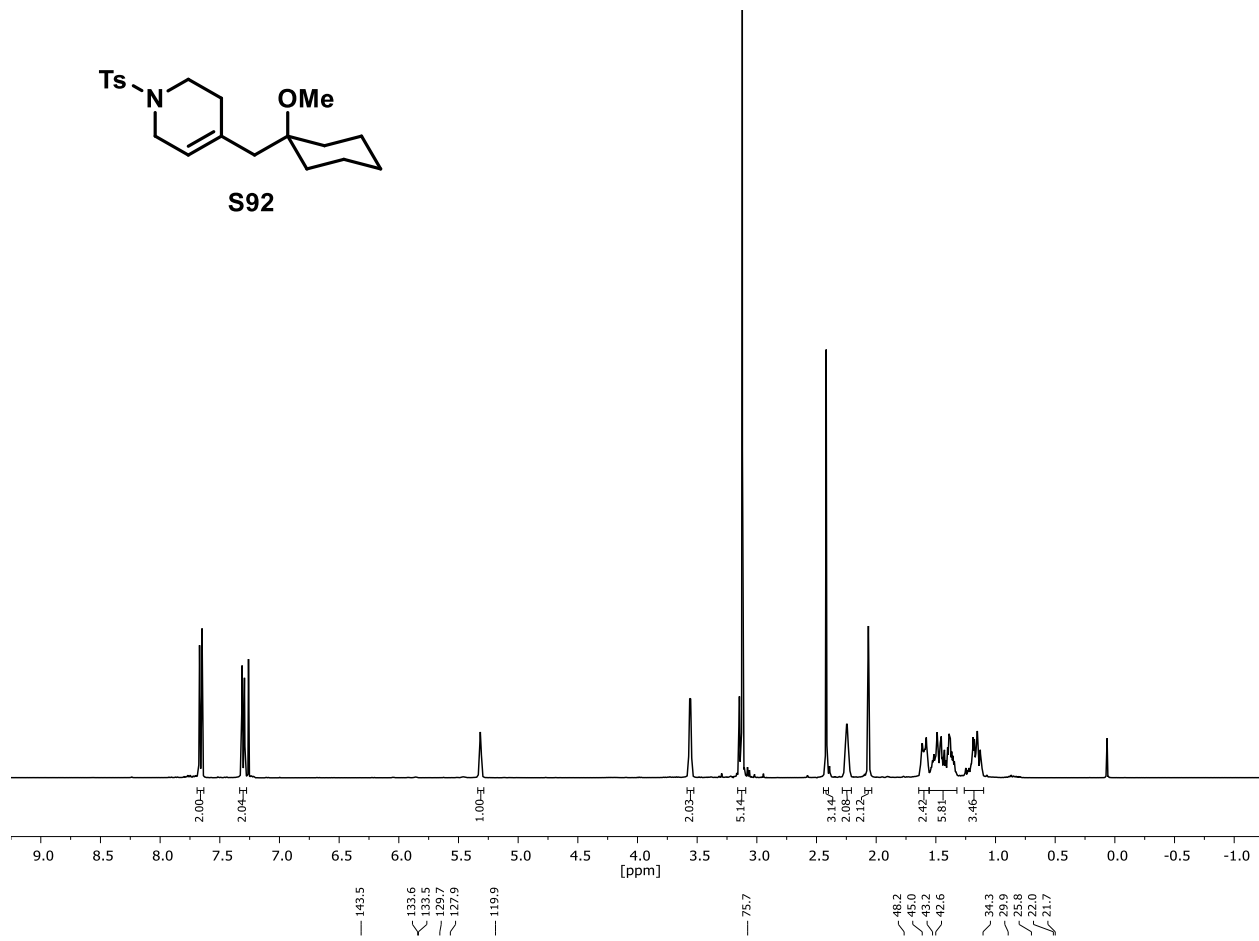
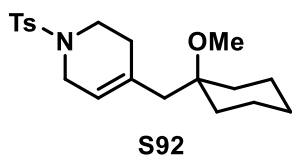


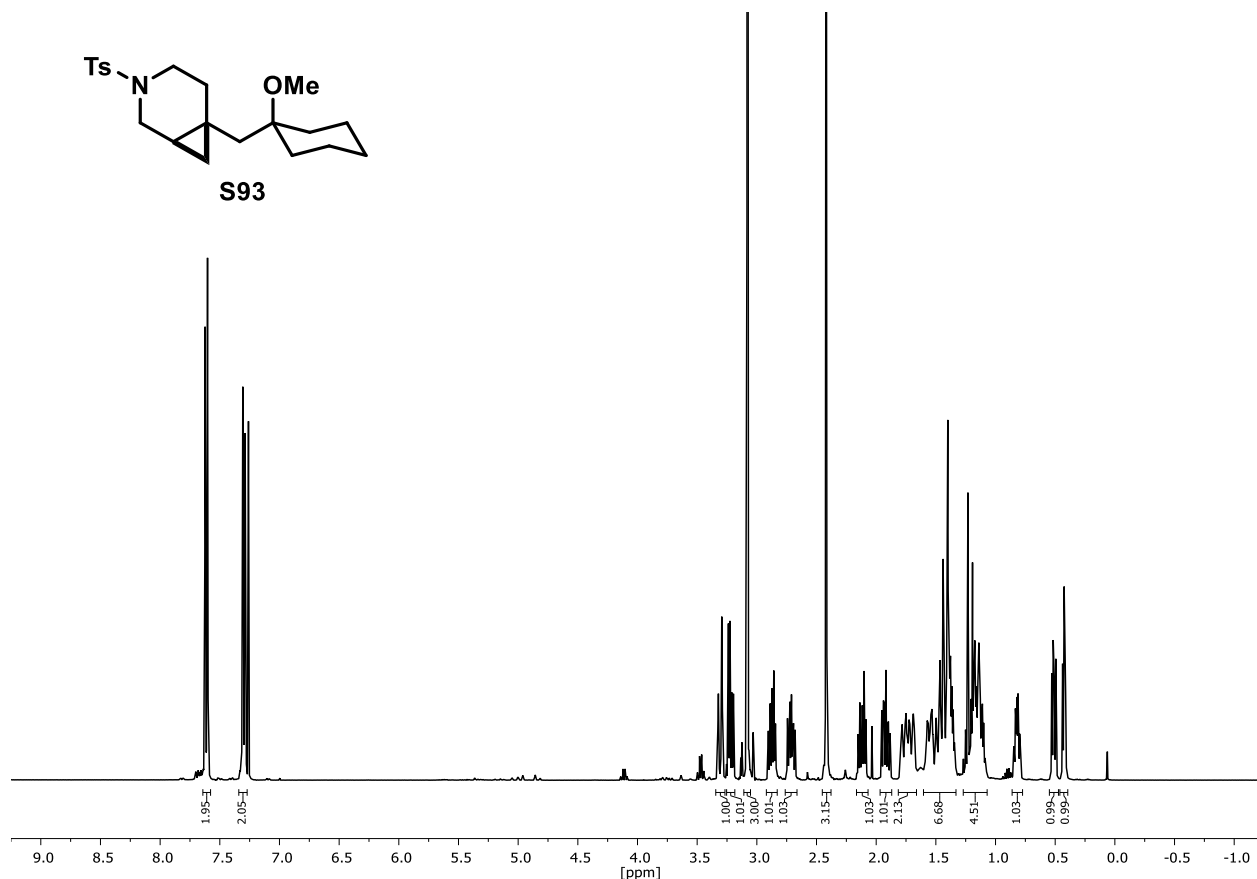
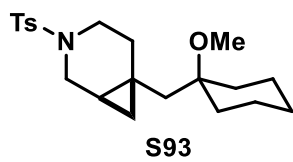




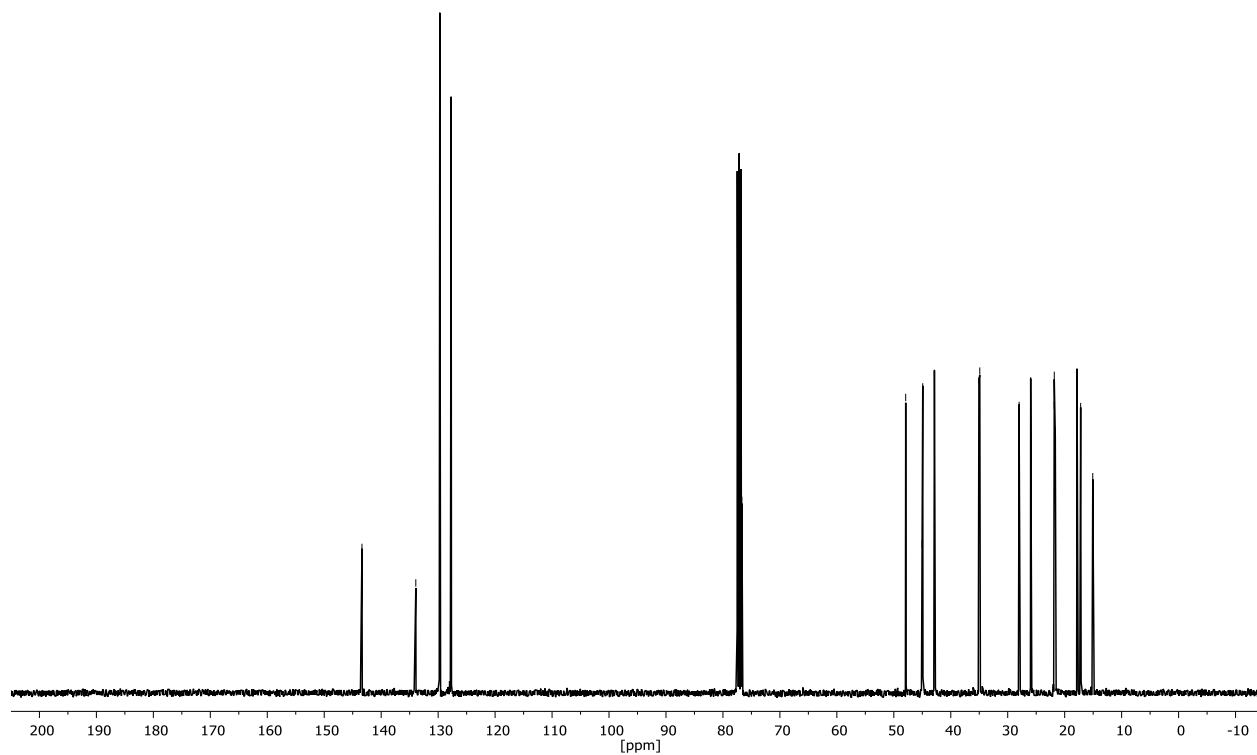


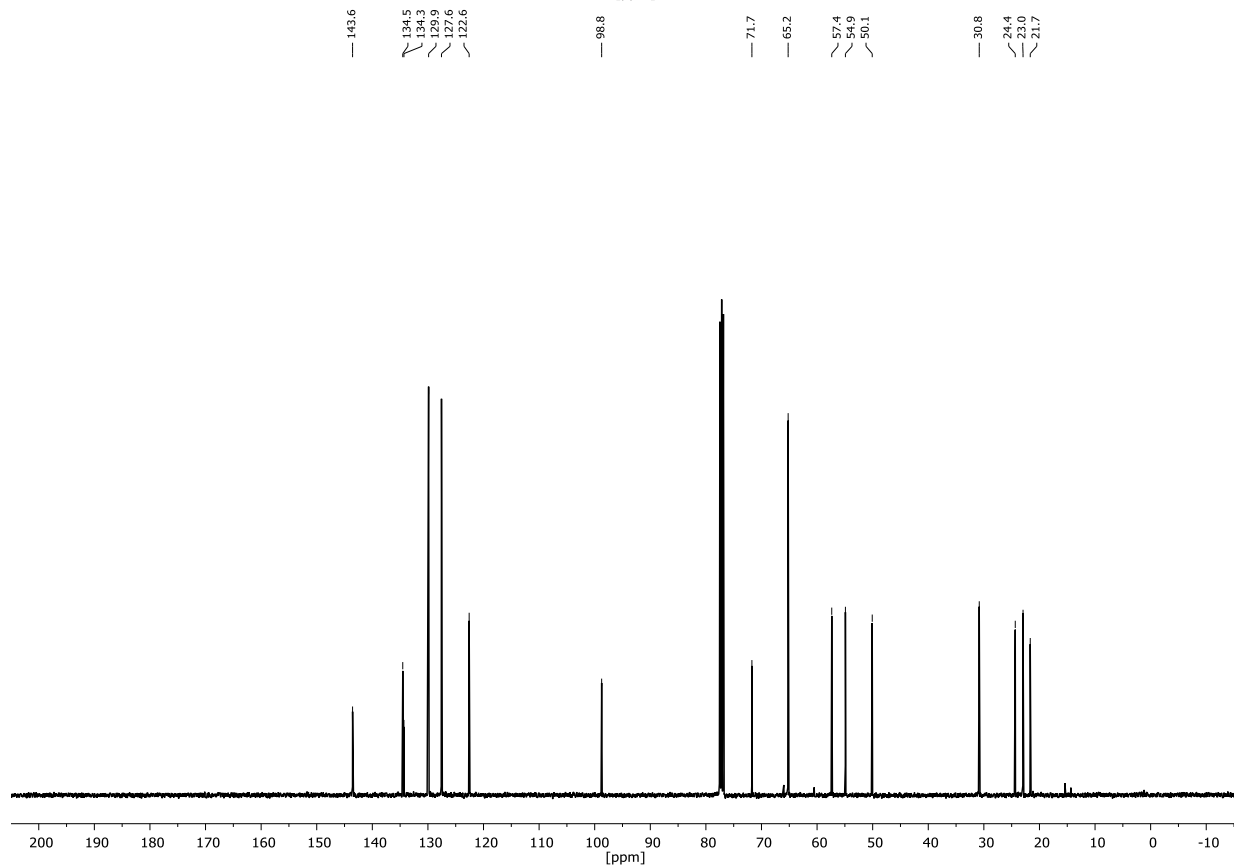
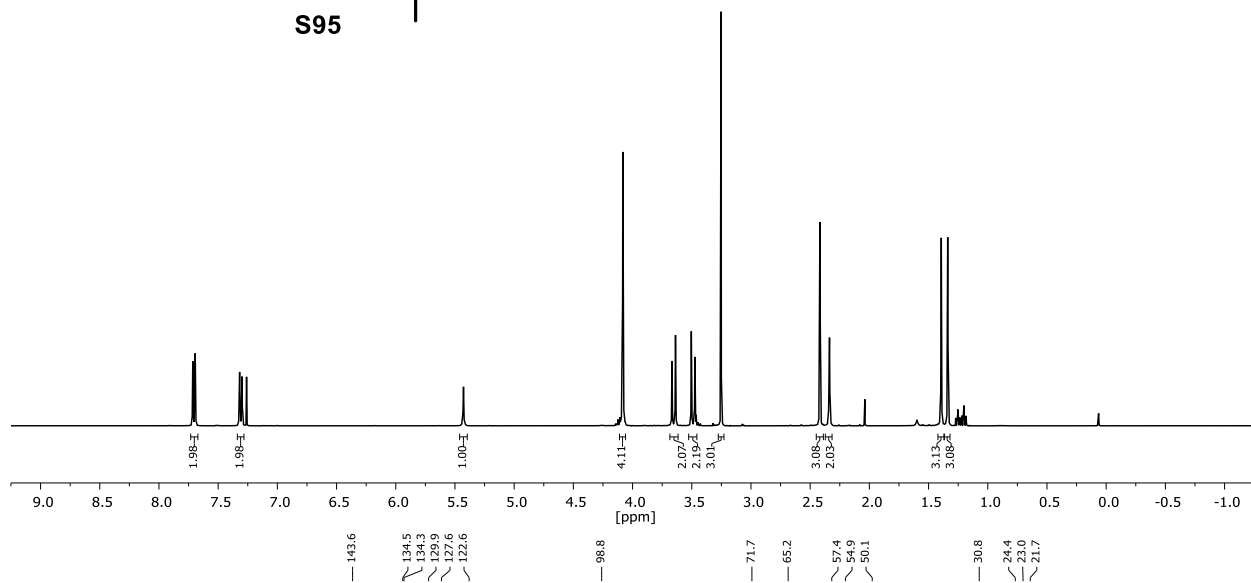
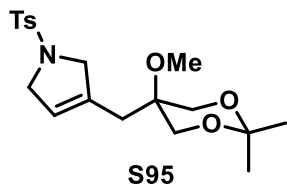


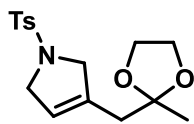




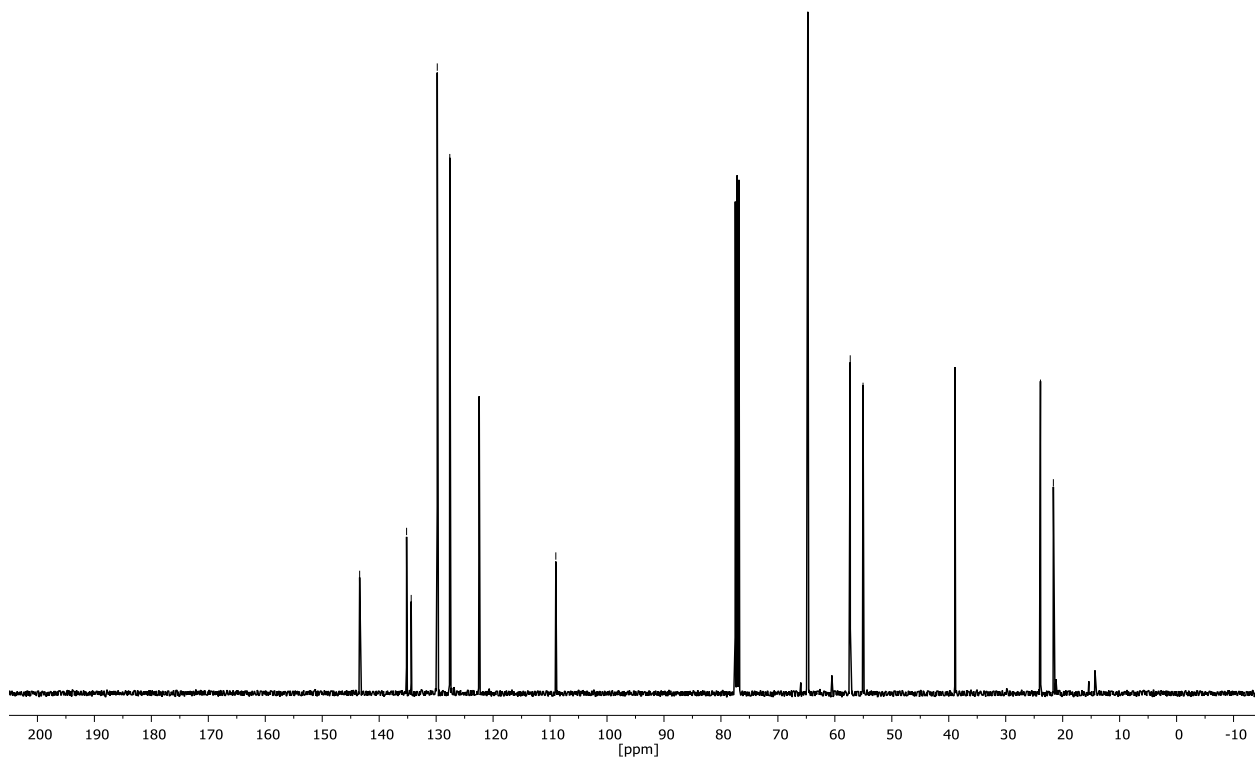
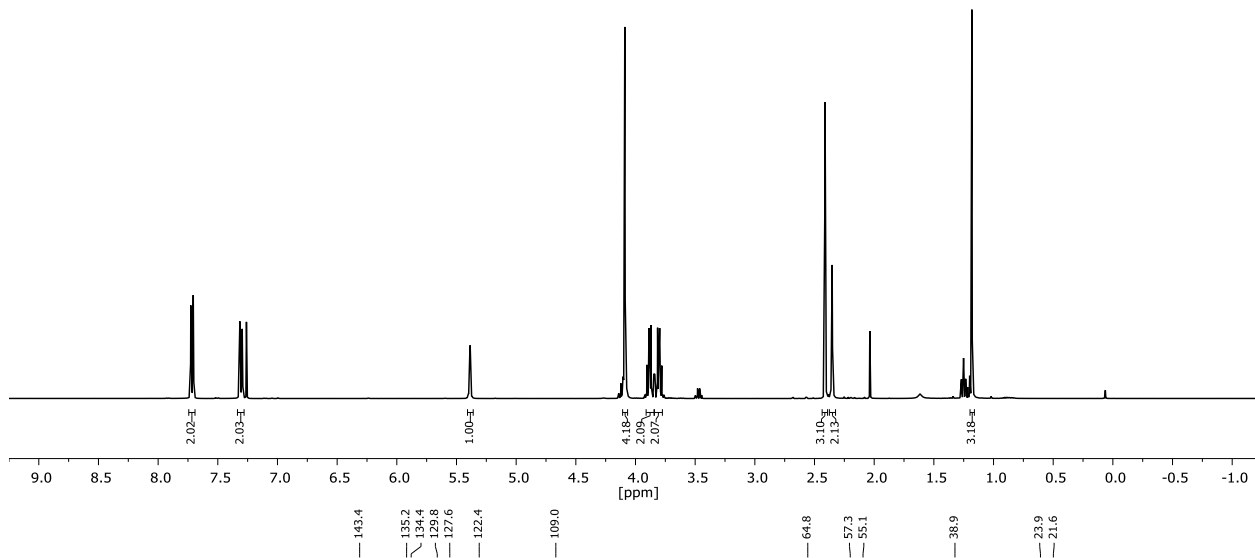
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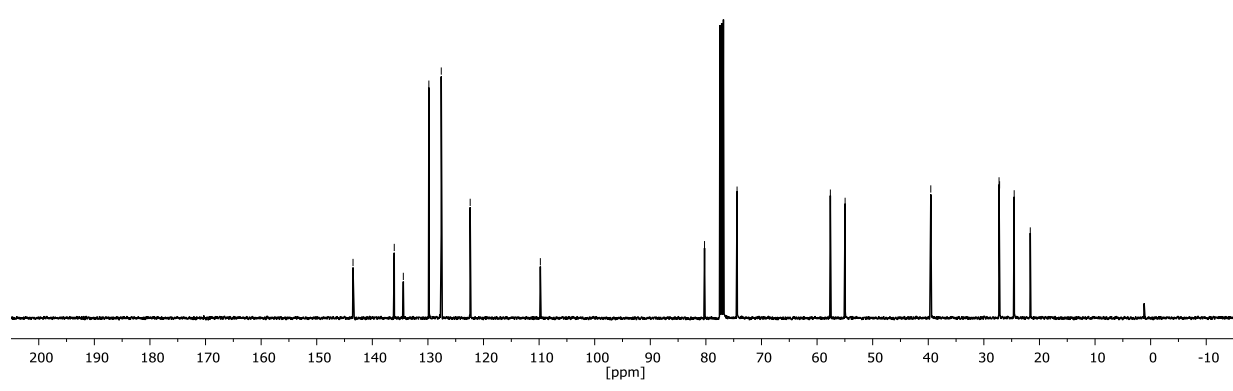
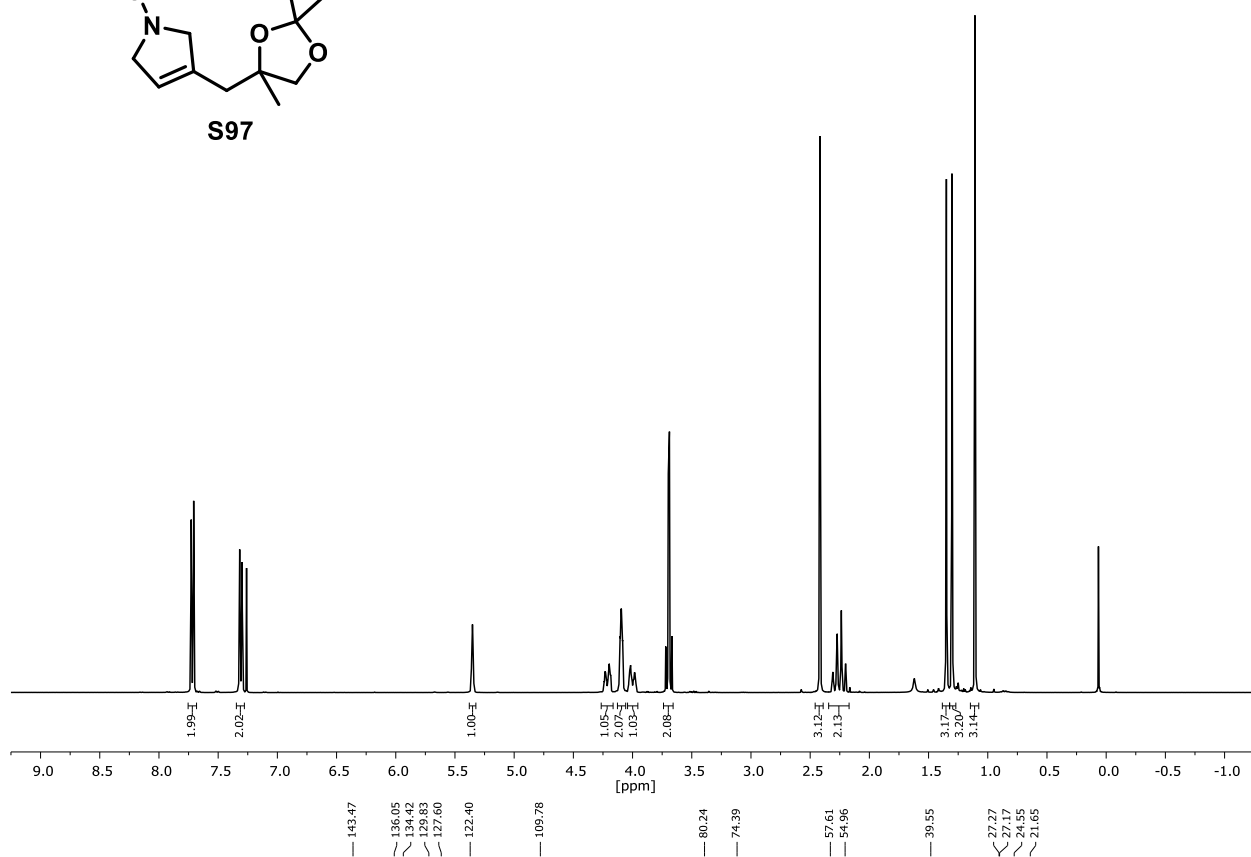
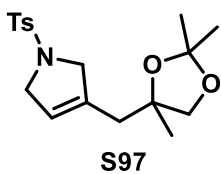


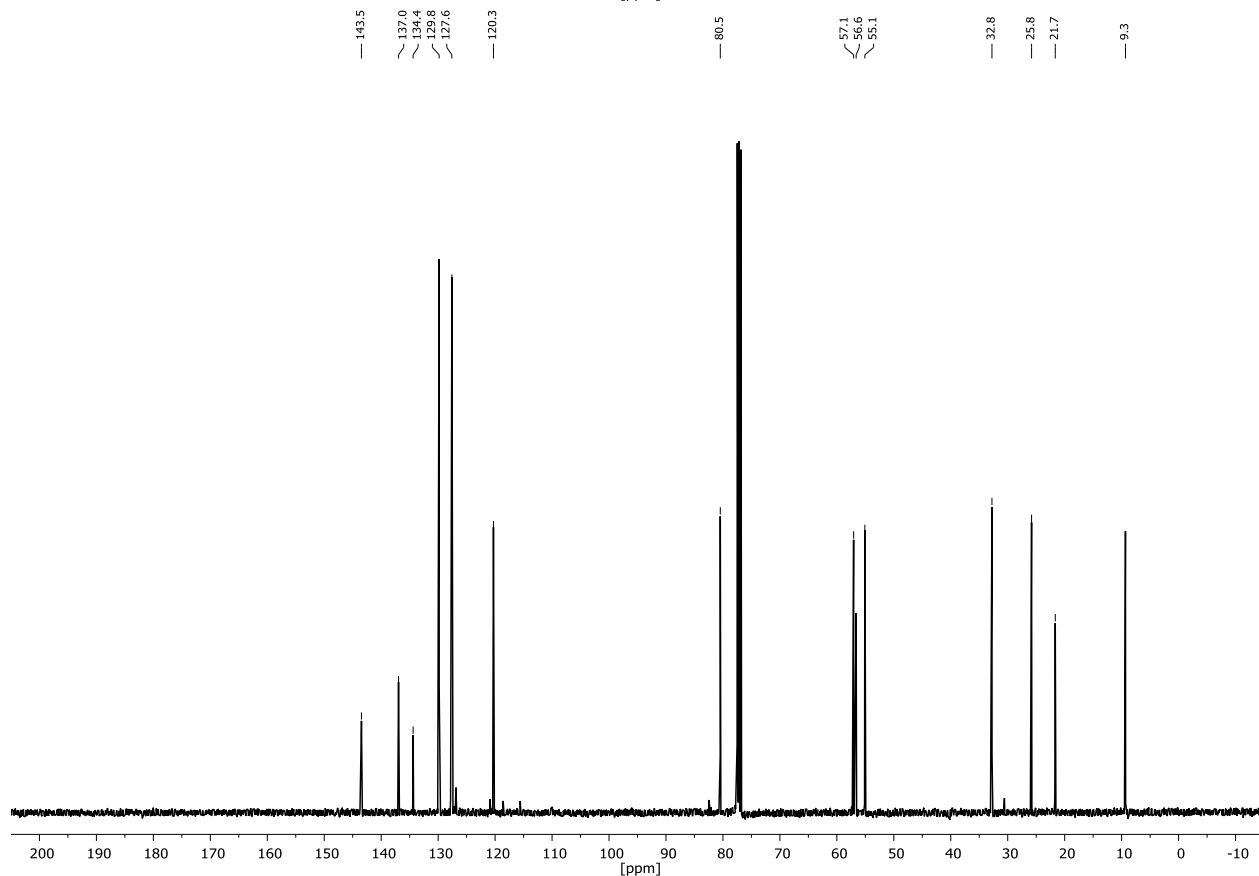
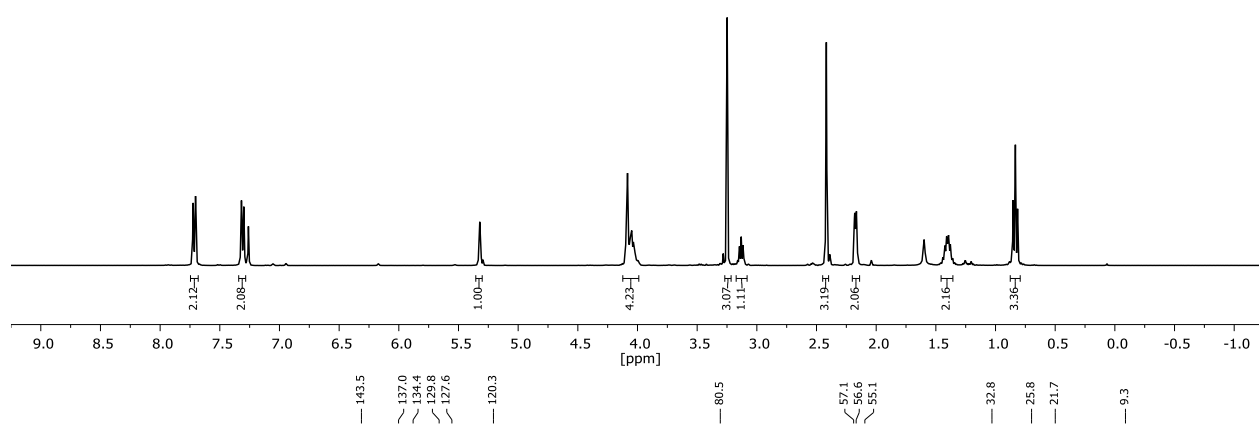
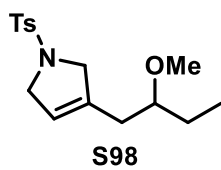


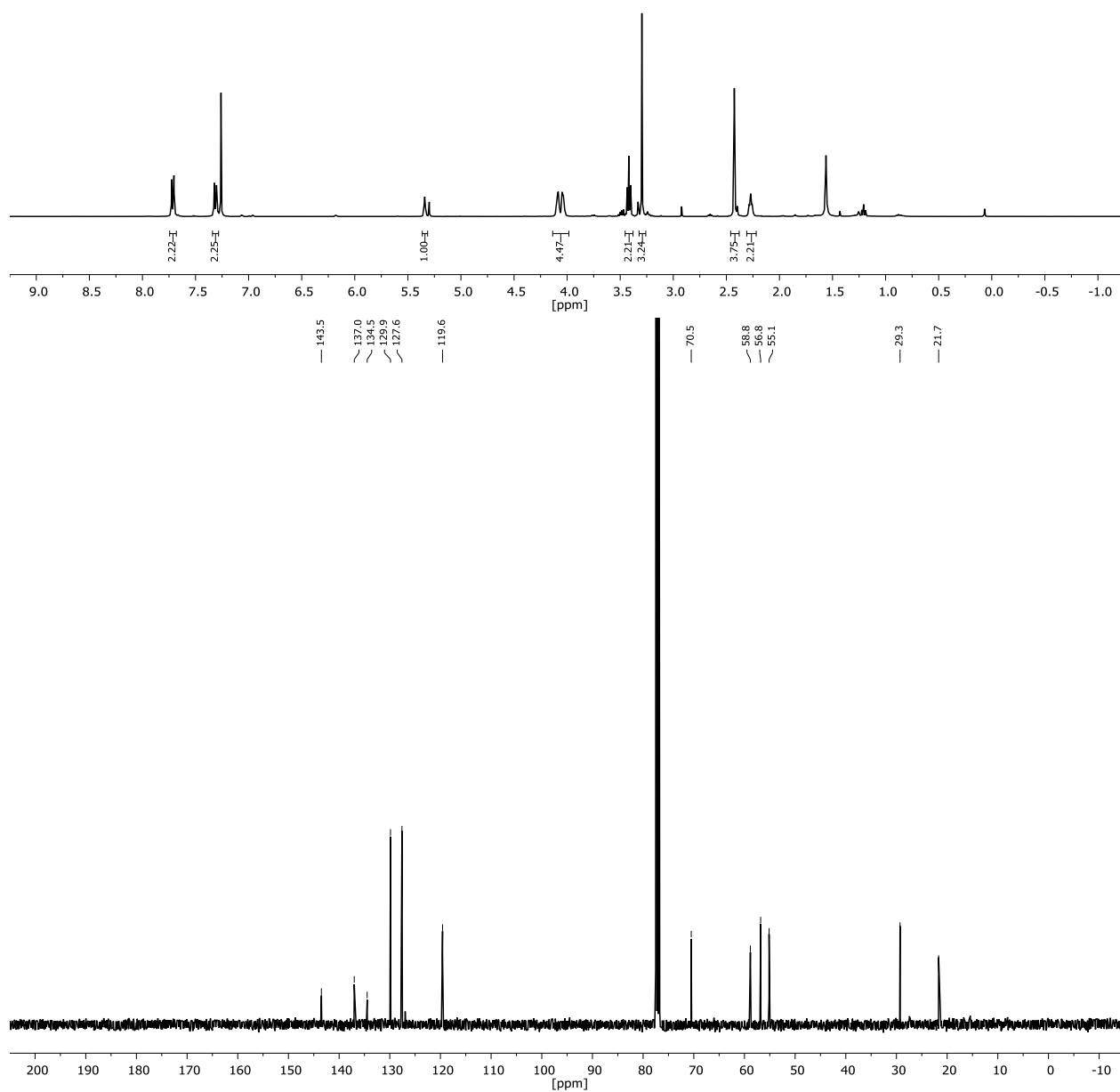
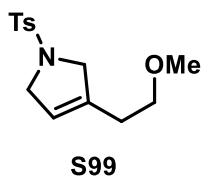


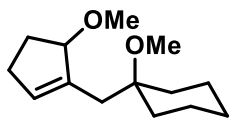
S96



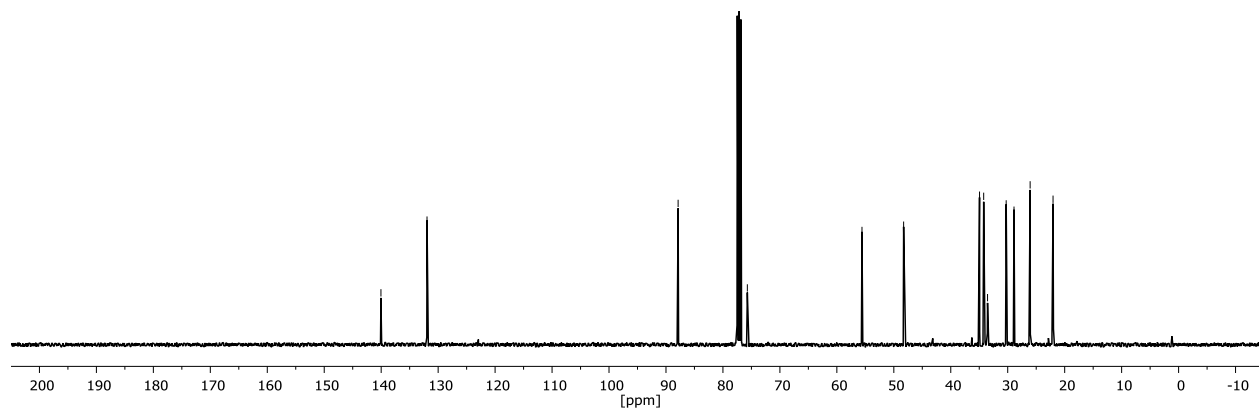
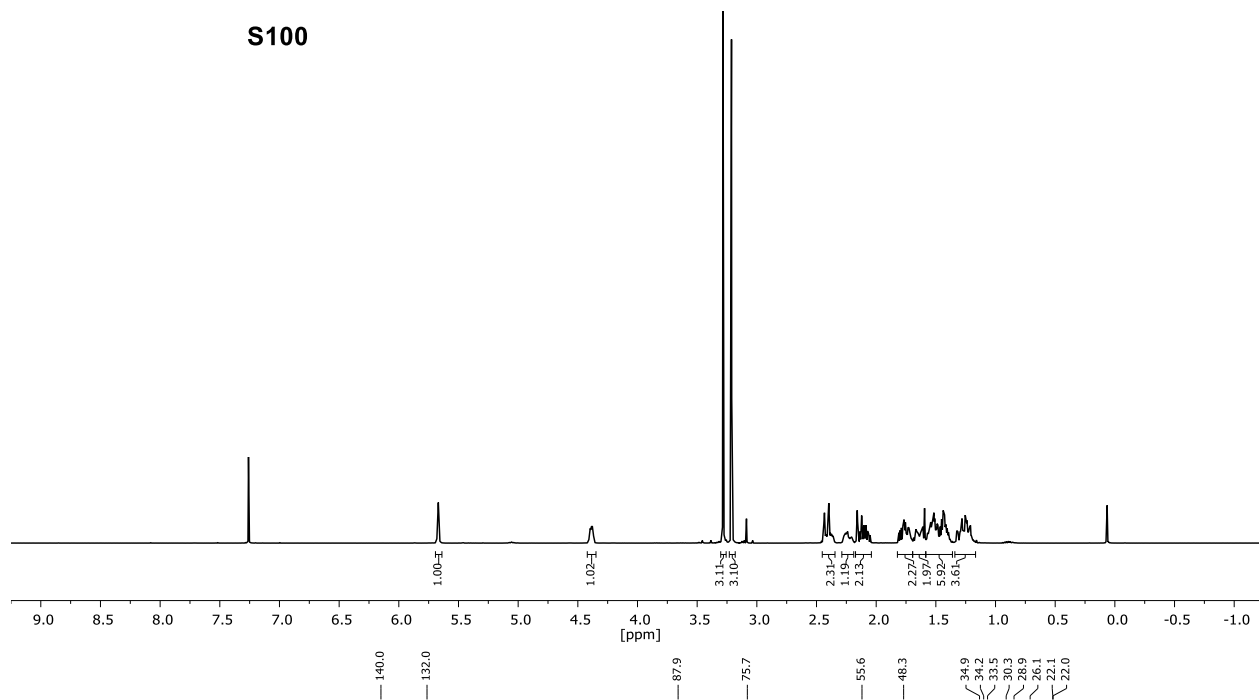


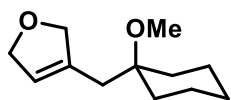






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