

Supporting Information Spectra

Asymmetric Synthesis of Deoxypropionate Derivatives via Catalytic Hydrogenolysis of Enantioenriched Z-Ketene Heterodimers.

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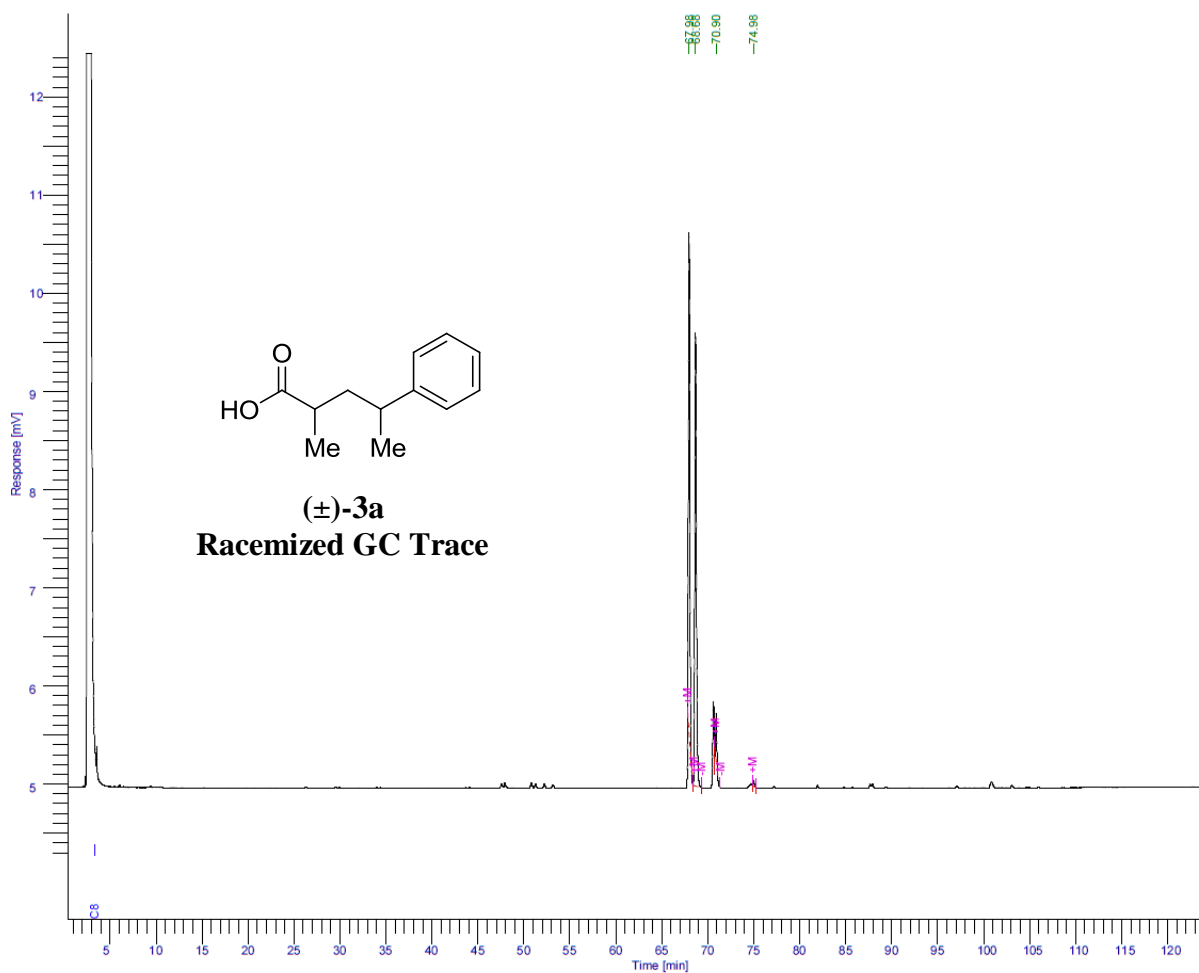
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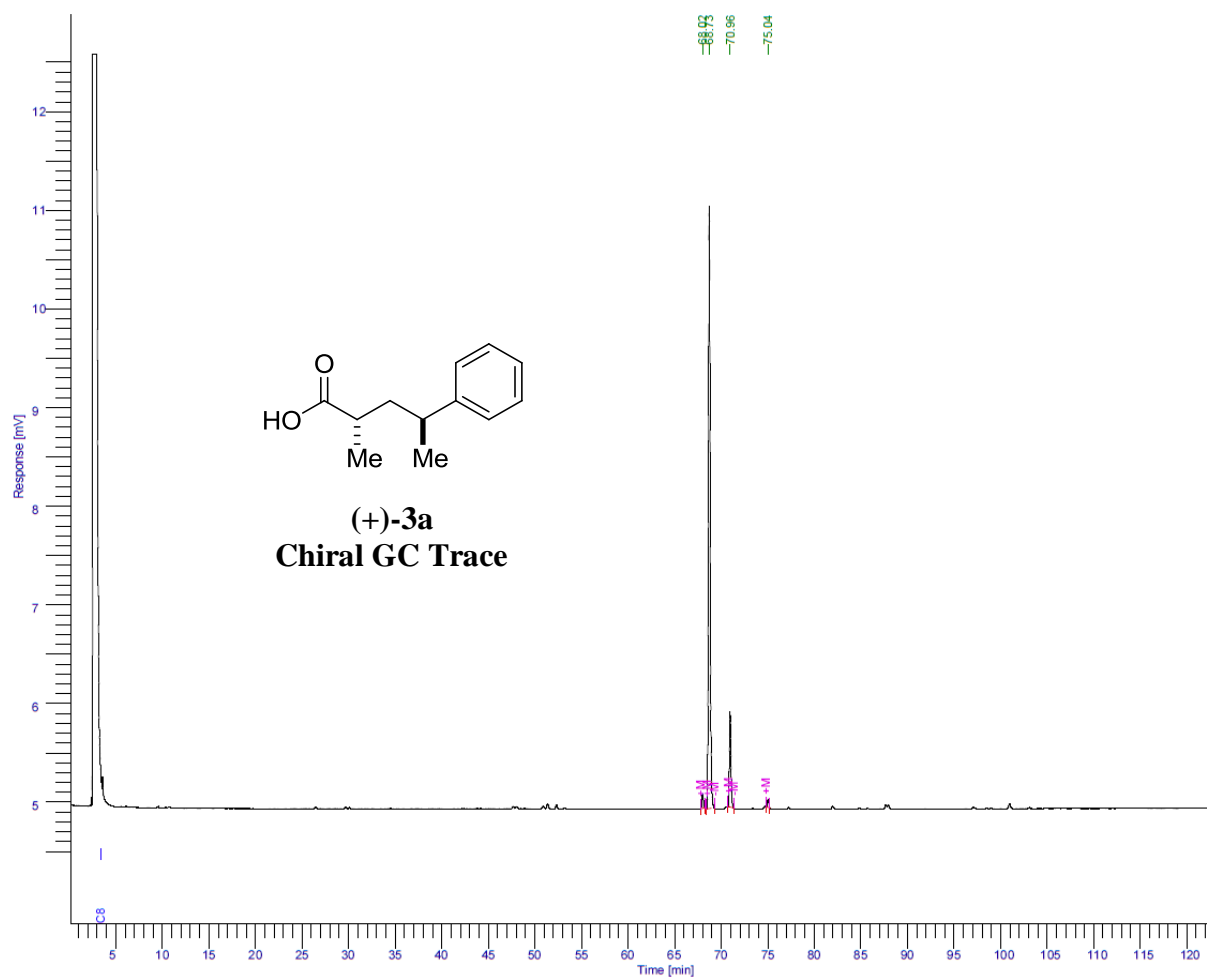
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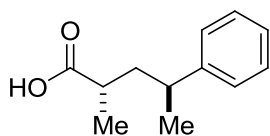
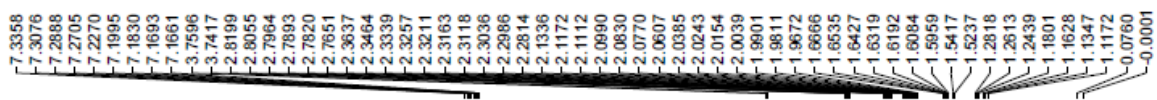
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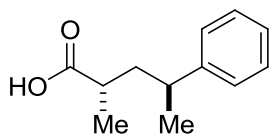
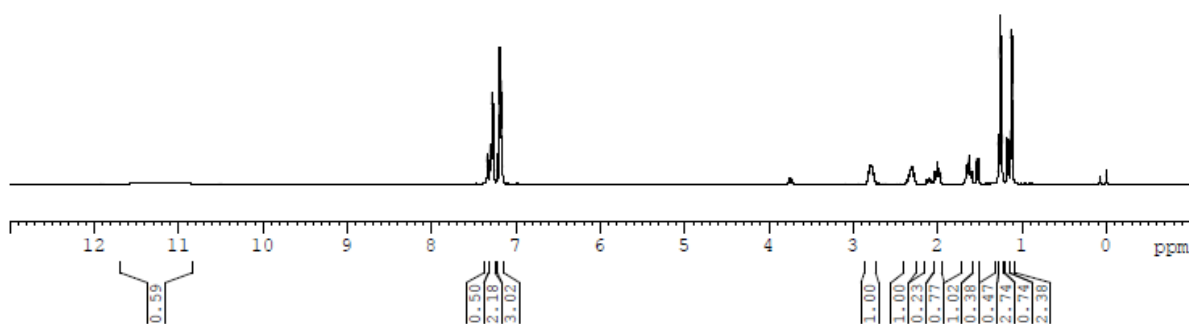
Peak #	Component Name	Time [min]	Area [uV*sec]	Height [uV]	Area/Amount	Raw Amount
1		67.984	53071.65	5124.37	-----	-----
2		68.675	56194.09	4611.50	1.0000e+06	0.0562
3		70.903	3965.89	467.56	1.0000e+06	0.0040
4		74.985	573.67	59.37	1.0000e+06	0.0006
			113805.31	10262.80	3.0000e+06	0.0607



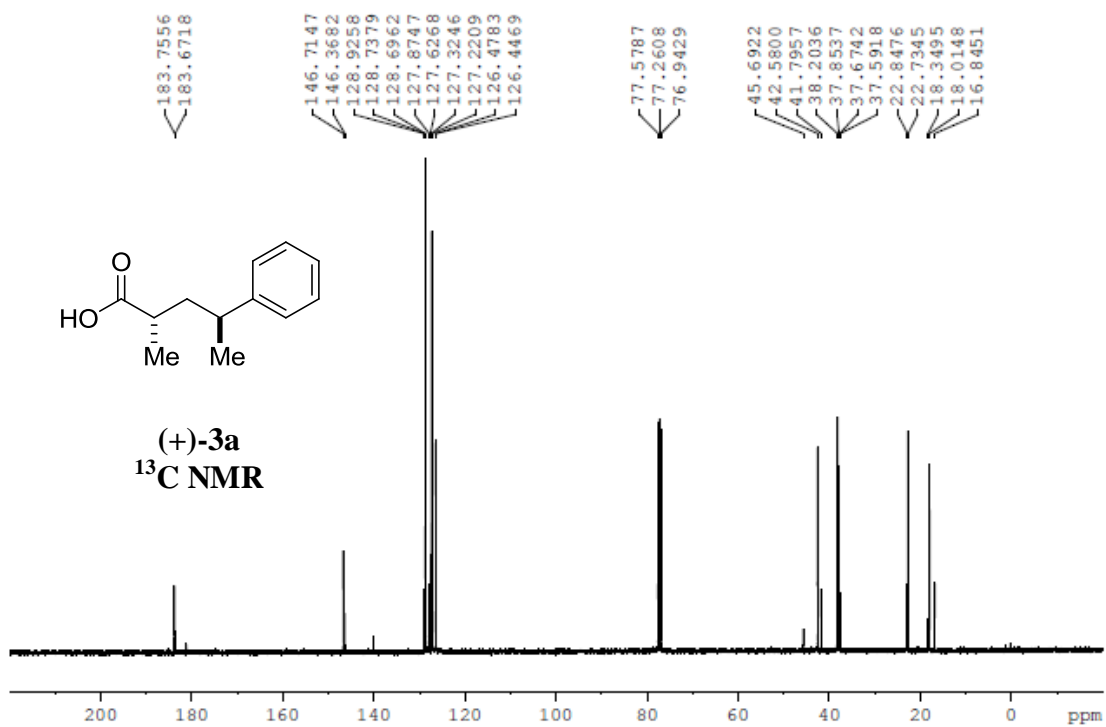
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1		68.021	1612.64	144.34	-----	-----
2		68.733	75492.97	6089.32	1.0000e+06	0.0755
3		70.965	11045.13	963.53	1.0000e+06	0.0110
4		75.037	875.08	85.50	1.0000e+06	0.0009
			89025.82	7282.70	3.0000e+06	0.0874

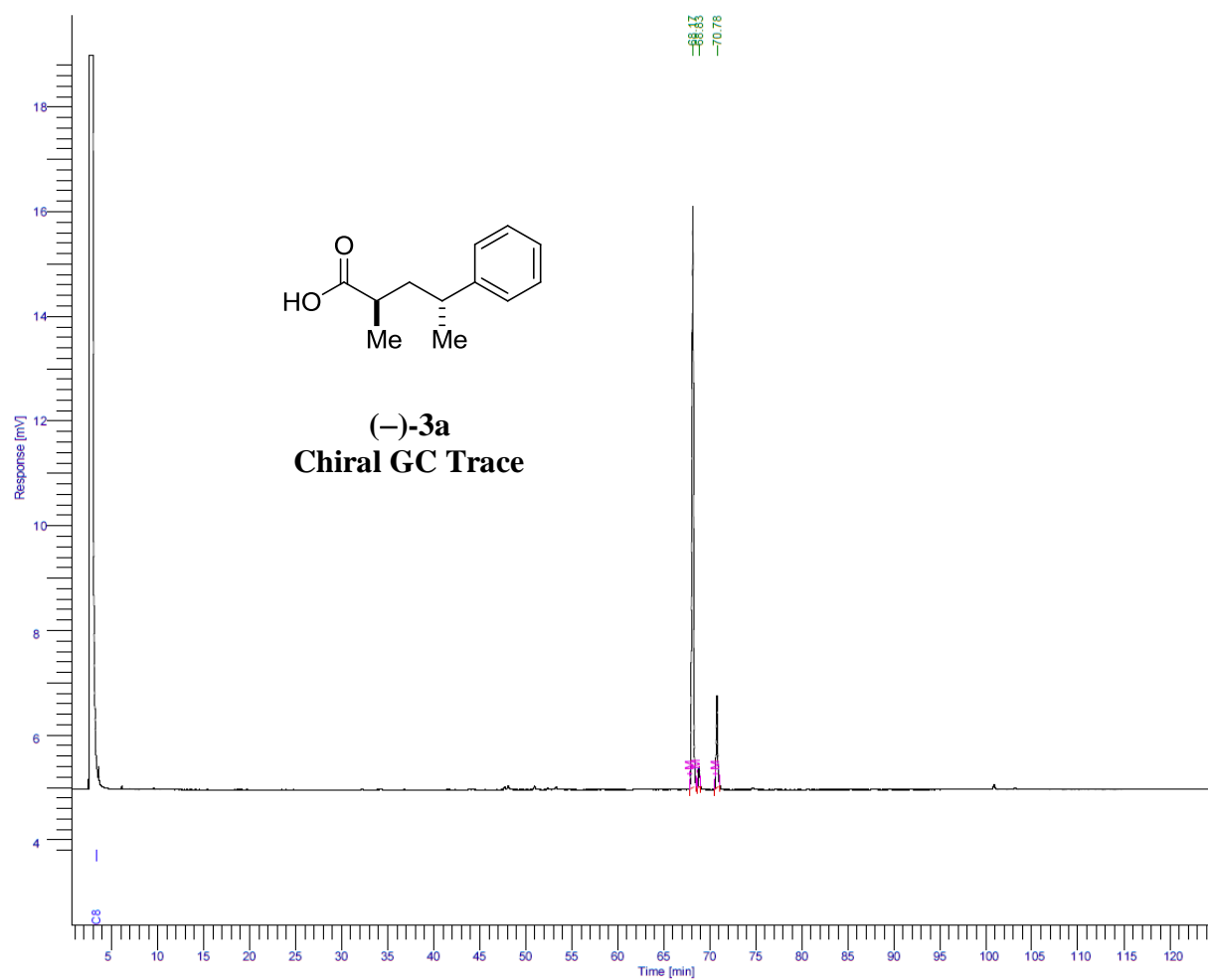


(+)-3a
¹H NMR

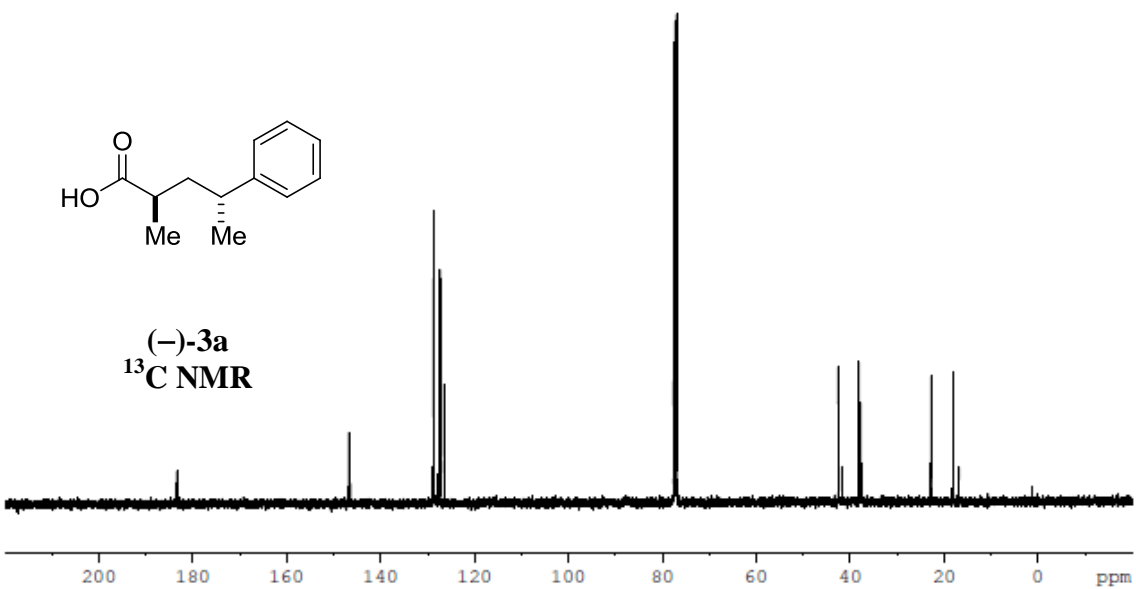
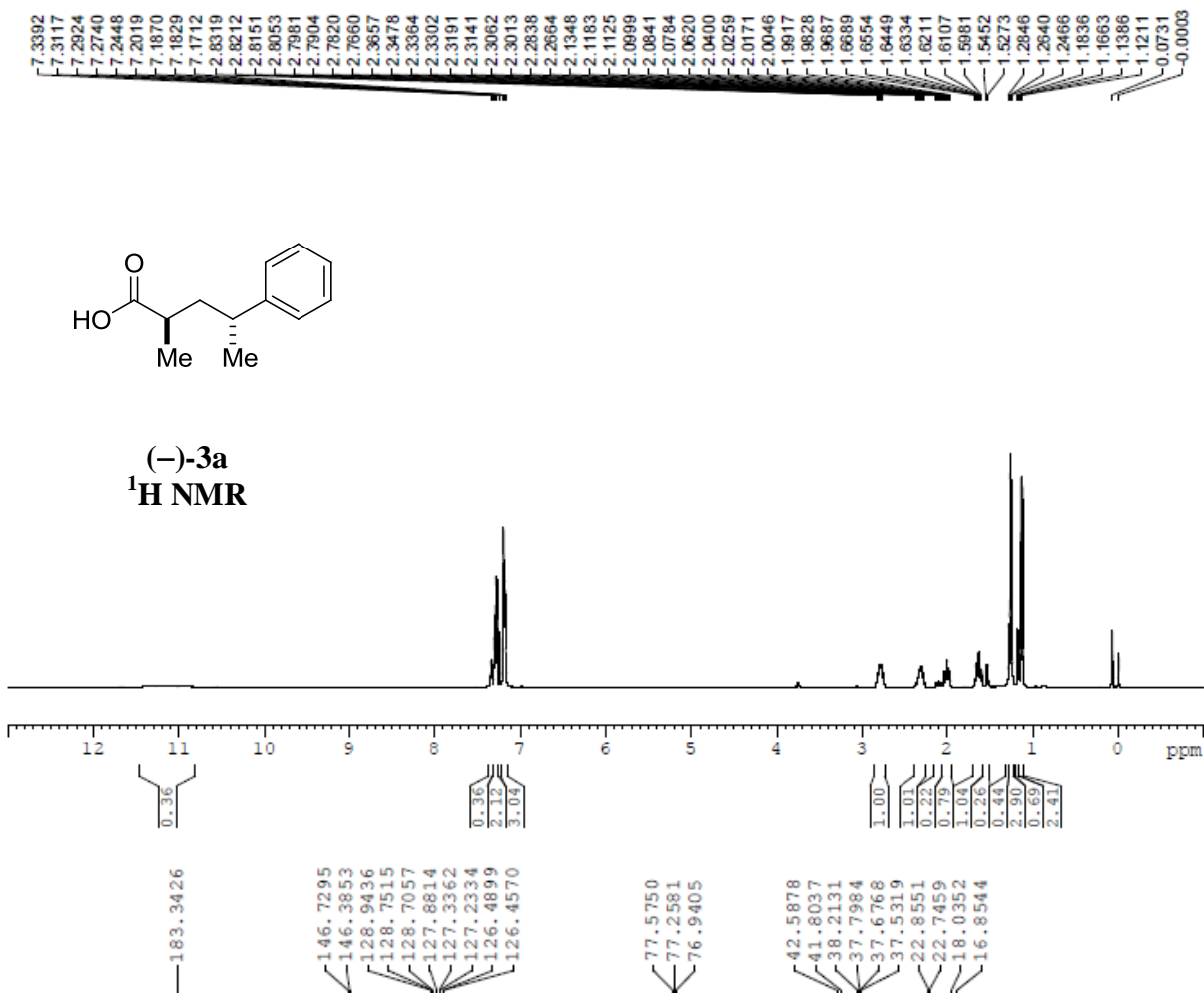


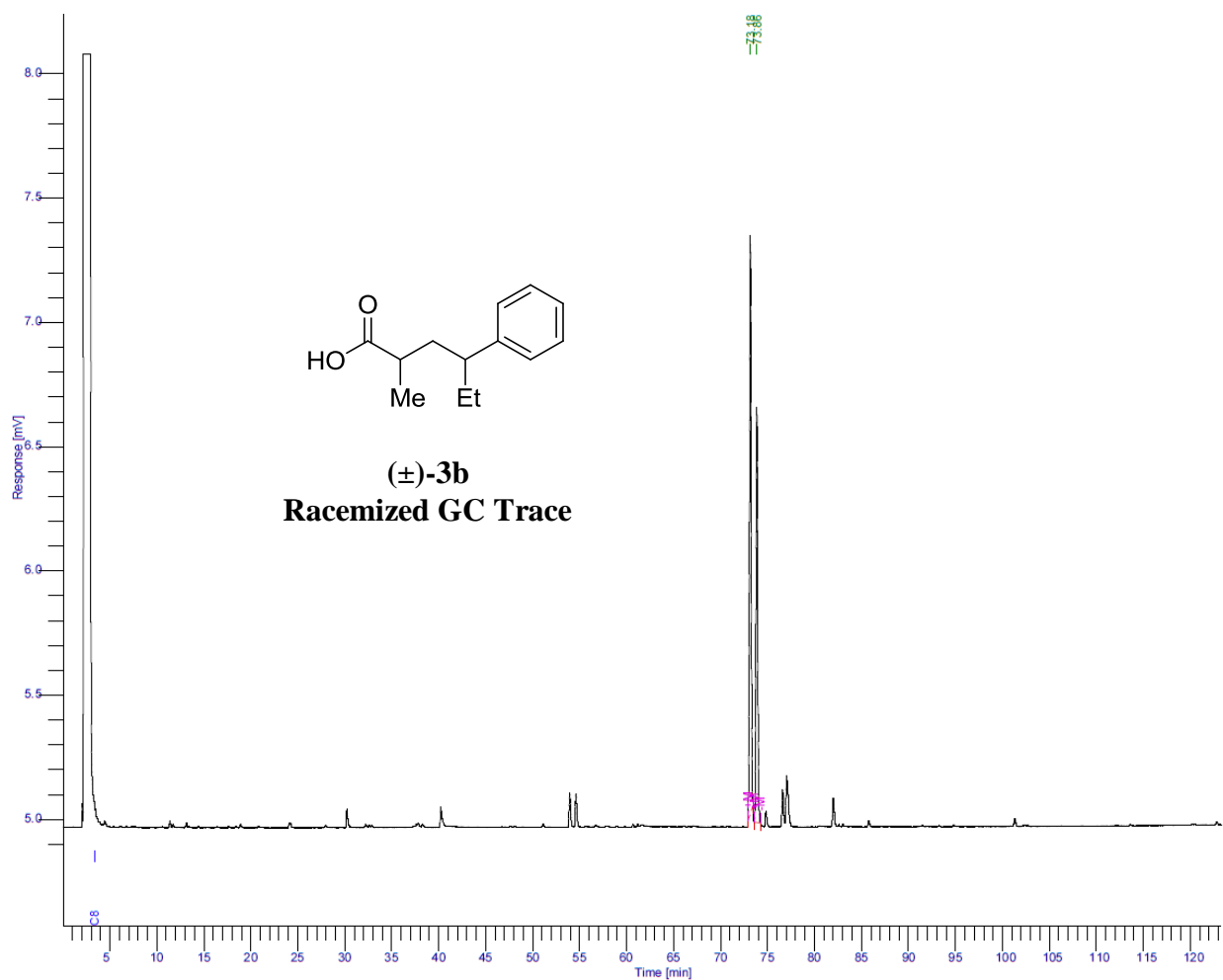
(+)-3a
¹³C NMR



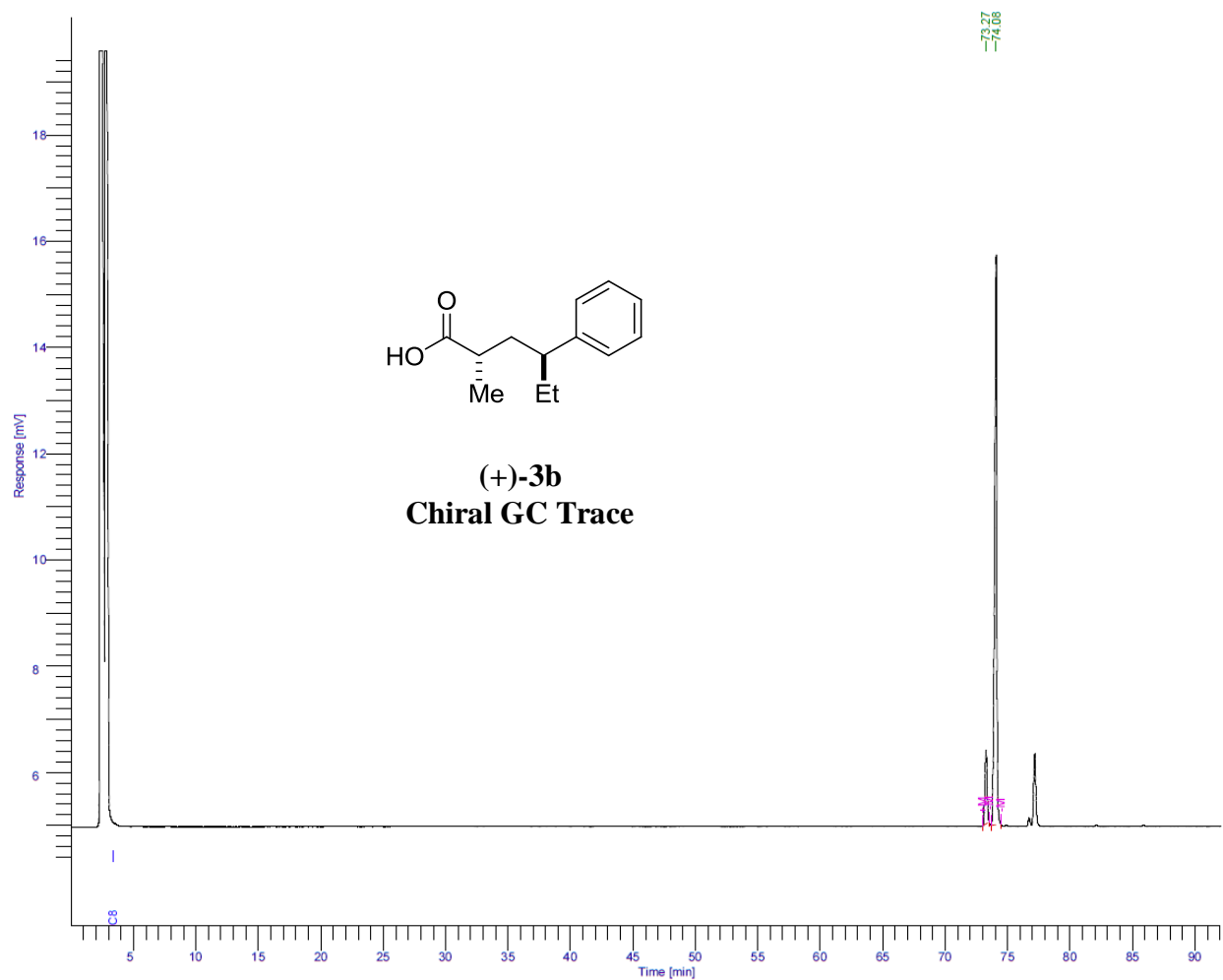


Peak #	Time [min]	Area [$\mu\text{V}\cdot\text{s}$]	Height [μV]	Area [%]	Norm. Area [%]	BL	Area/Height [s]
-	3.350	0.00	0.00	0.00	0.00		-----
1	68.171	134403.31	11091.31	84.30	84.30	*BB	12.1179
2	68.832	4208.51	391.73	2.64	2.64	*BB	10.7434
3	70.776	20826.96	1748.20	13.06	13.06	*BB	11.9134
		159438.79	13231.23	100.00	100.00		

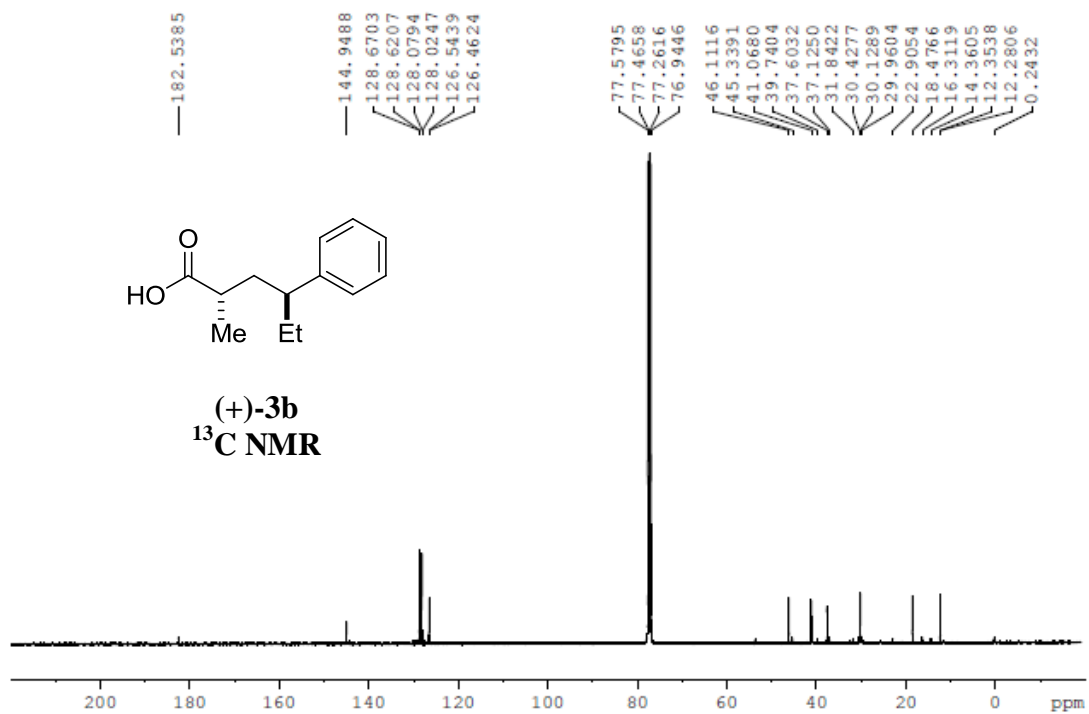
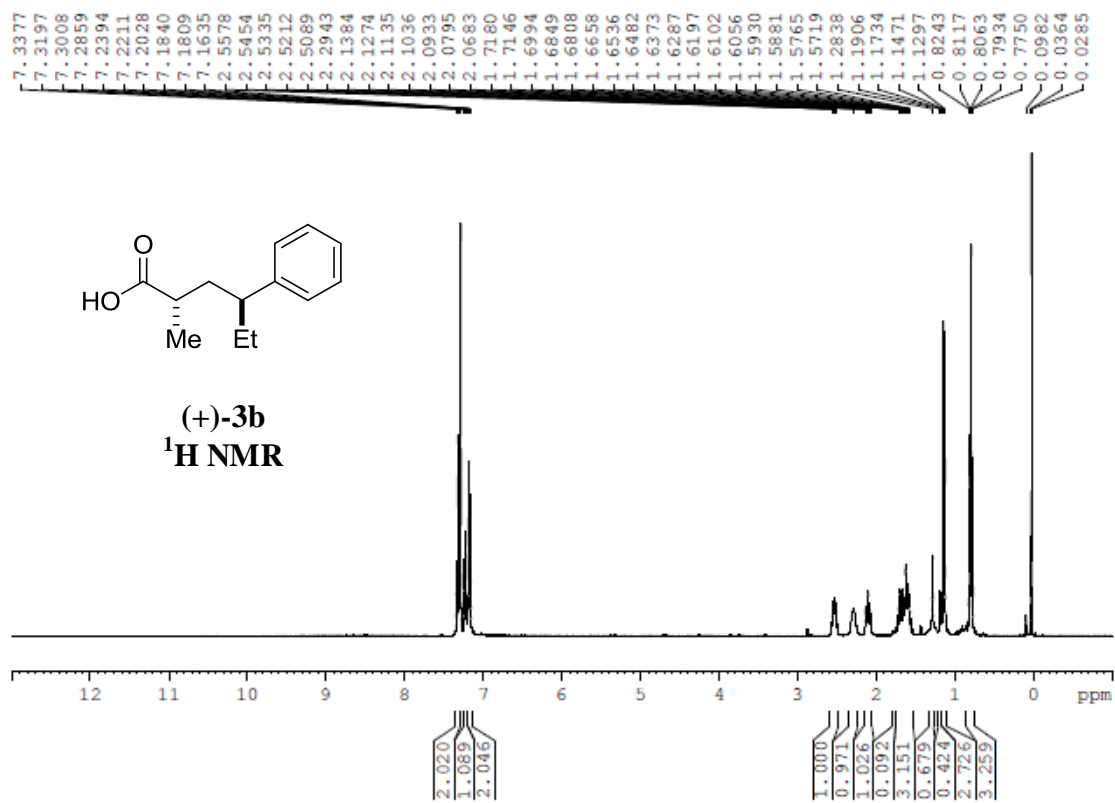


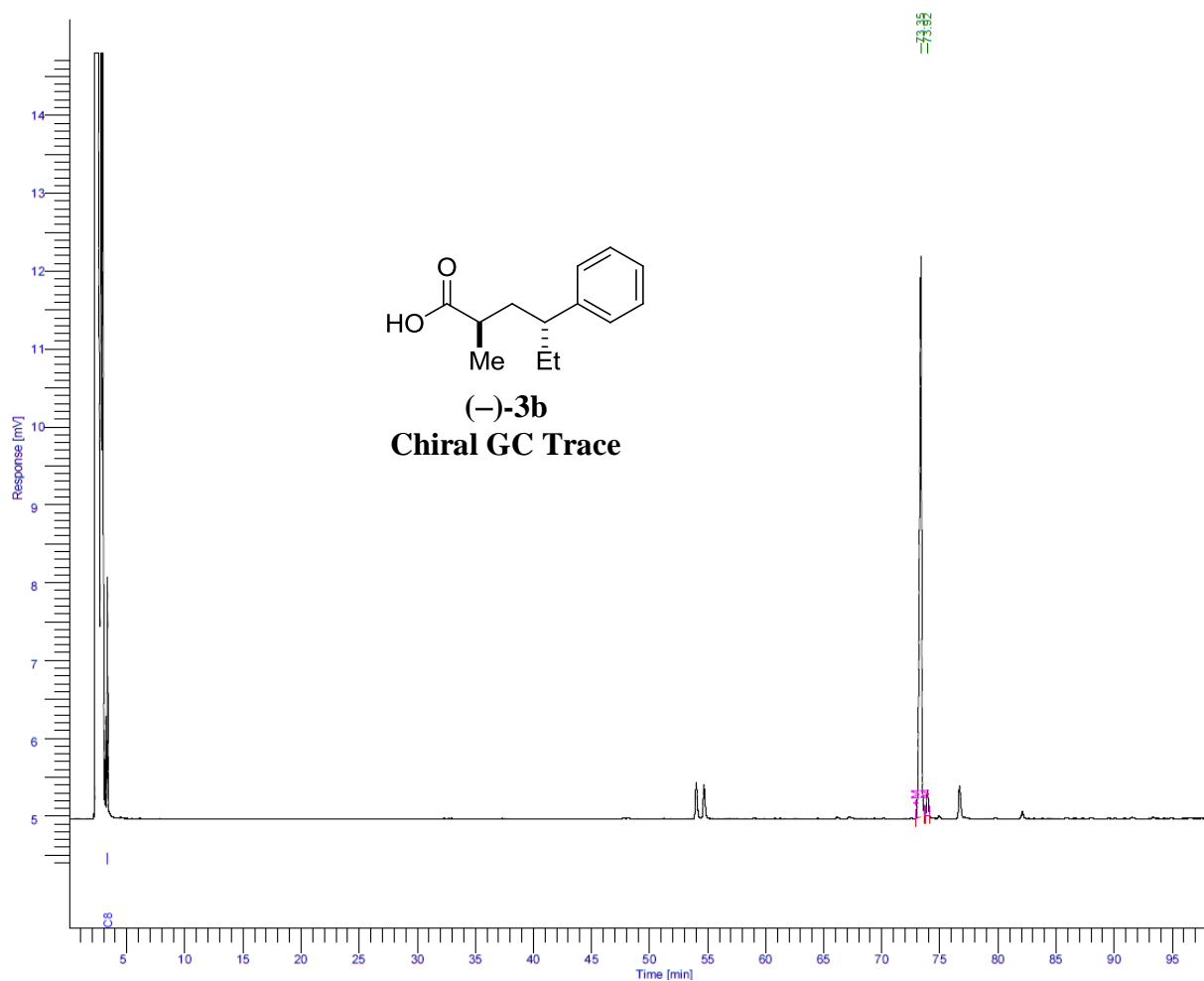


Peak #	Component Name	Time [min]	Area [uV*sec]	Height [uV]	Area/Amount	Raw Amount
1		73.179	27229.92	2321.66	-----	-----
2		73.864	19937.60	1667.17	1.0000e+06	0.0199
			47167.52	3988.84	1.0000e+06	0.0199

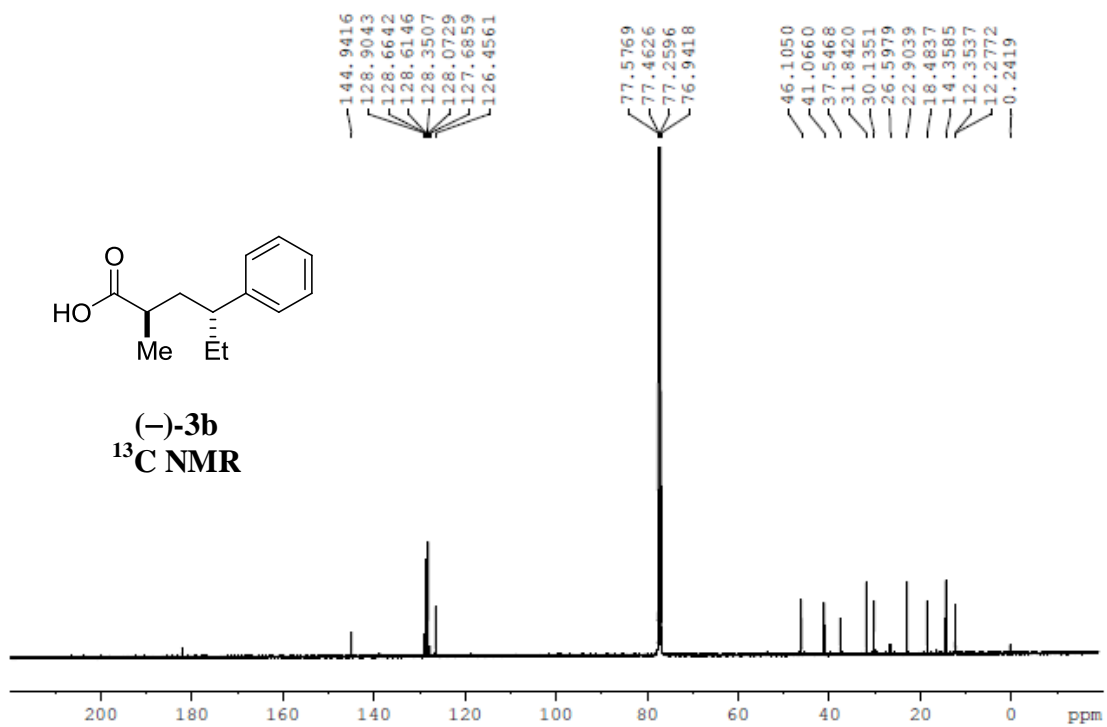
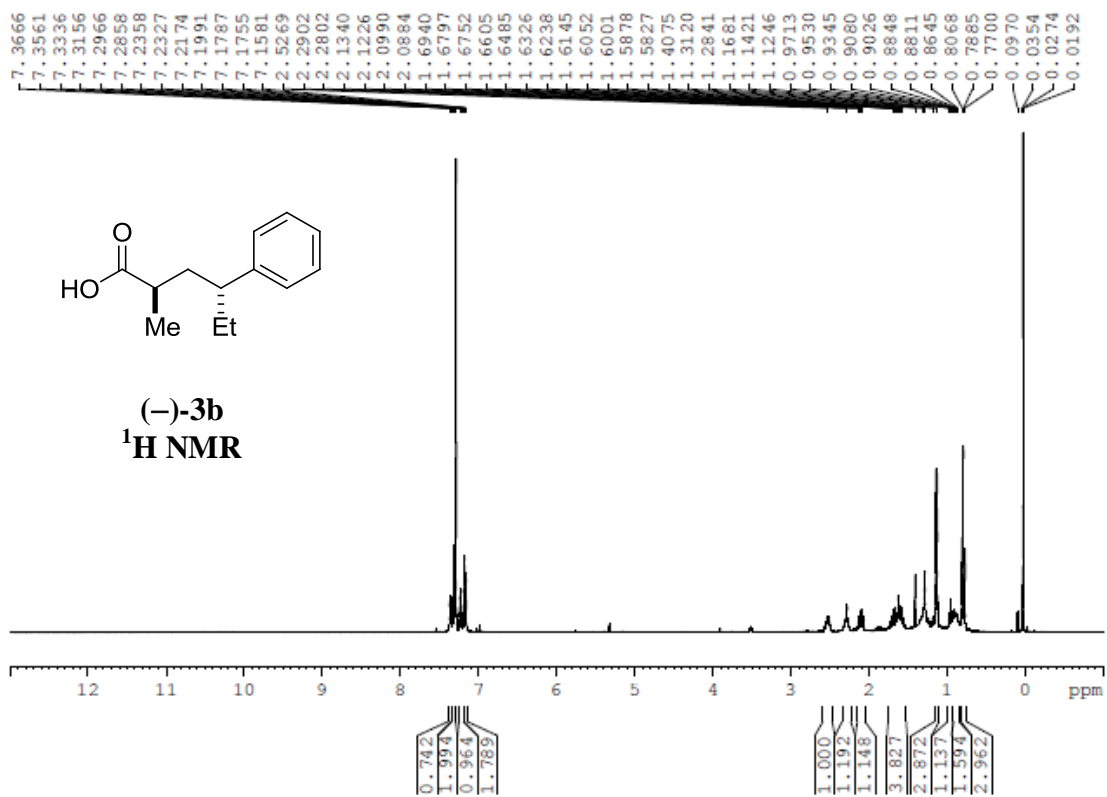


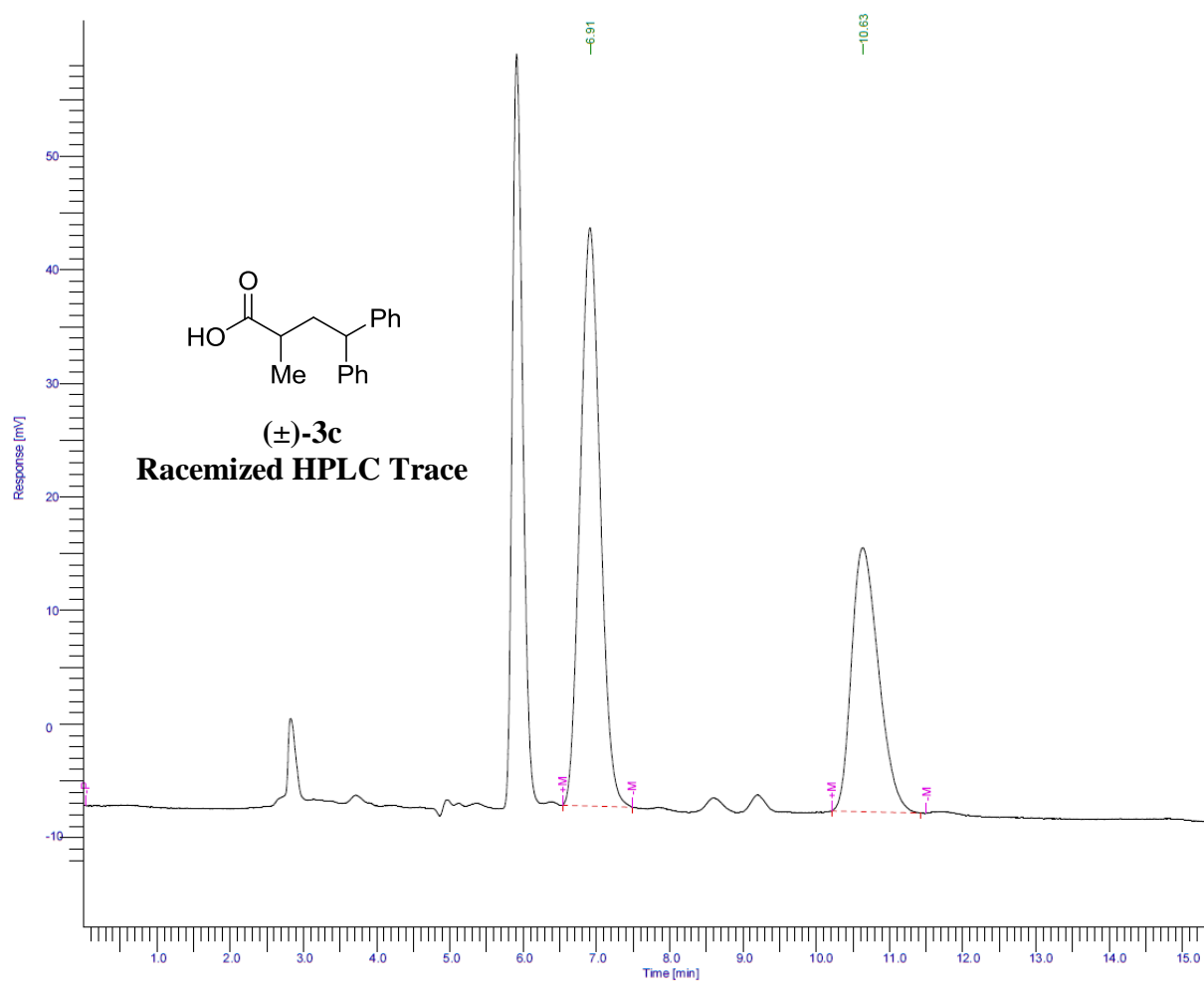
Peak #	Component Name	Time [min]	Area [uV*sec]	Height [uV]	Area/Amount	Raw Amount
1		73.275	15831.56	1389.85	-----	-----
2		74.082	132224.61	10721.06	1.0000e+06	0.1322
			148056.16	12110.91	1.0000e+06	0.1322



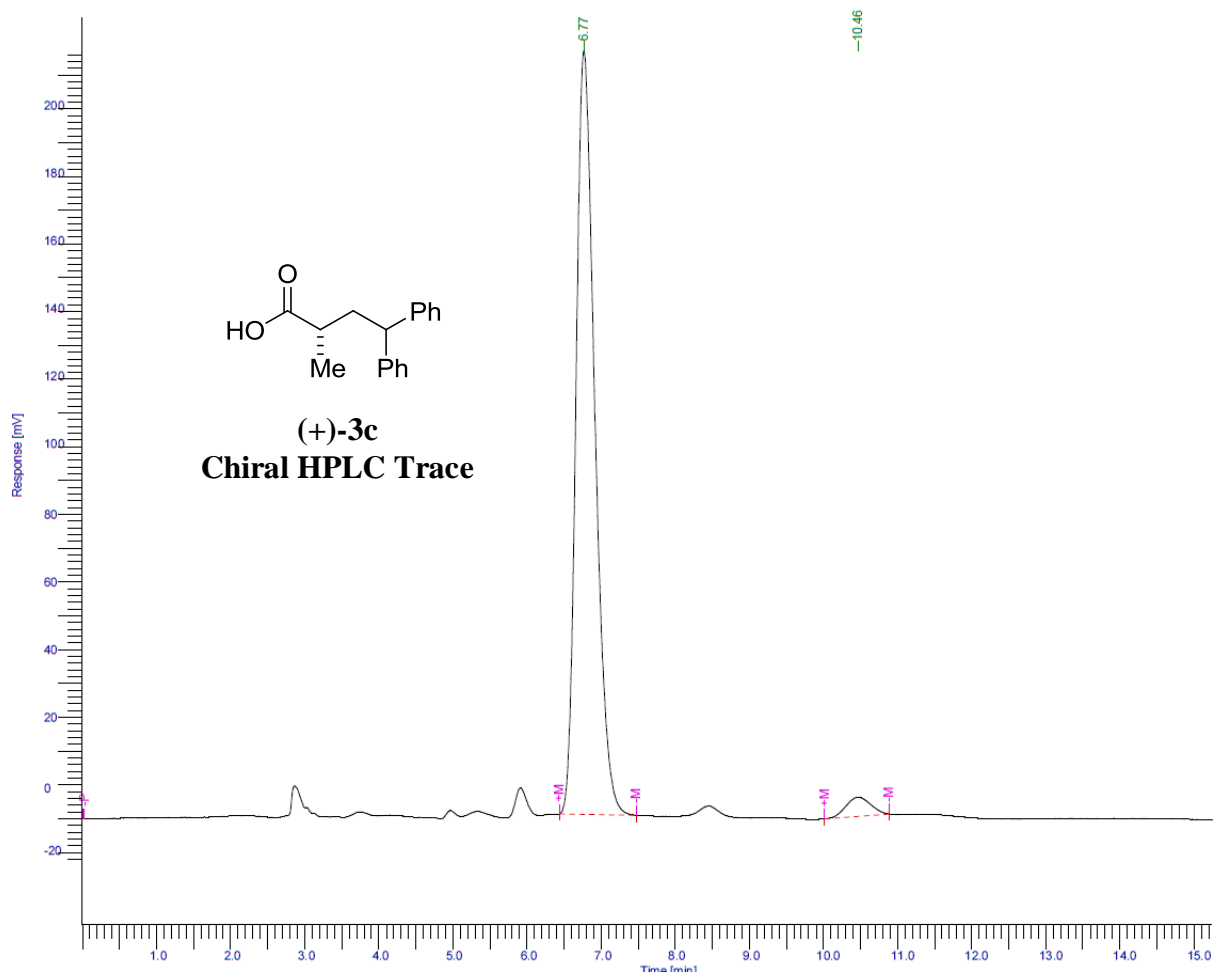


Peak #	Component Name	Time [min]	Area [uV*sec]	Height [uV]	Area/Amount	Raw Amount
1		73.349	88987.08	7205.18	-----	-----
2		73.923	3590.13	333.49	1.0000e+06	0.0036
			92577.21	7538.67	1.0000e+06	0.0036

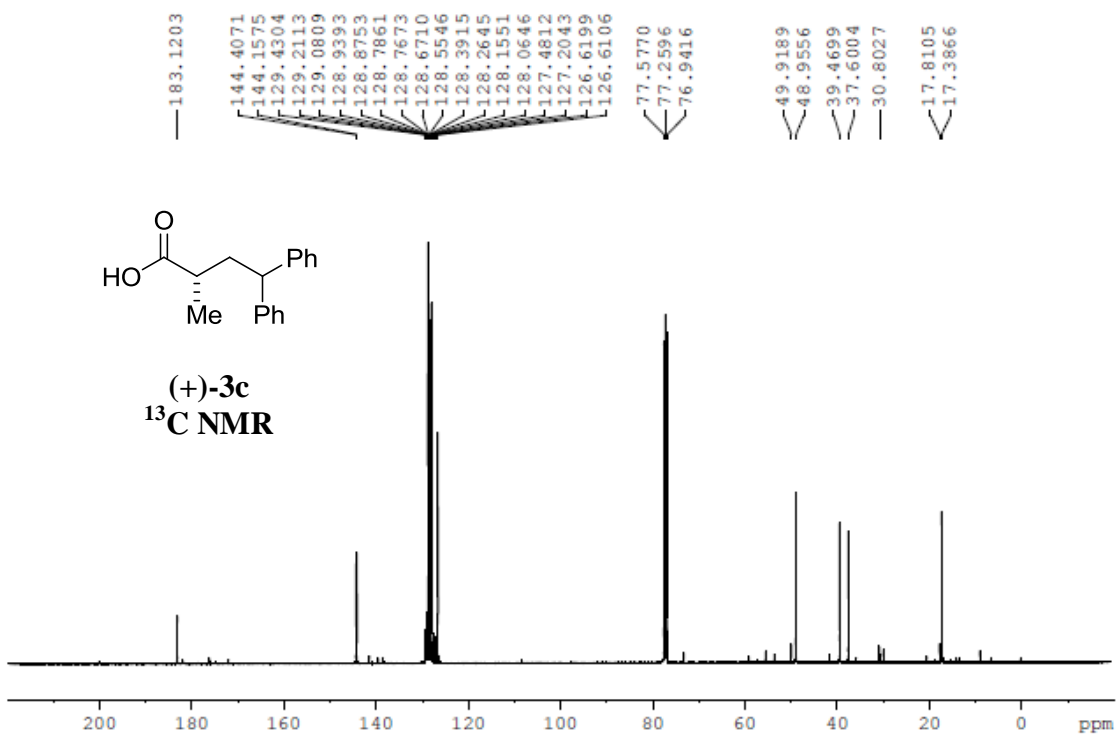
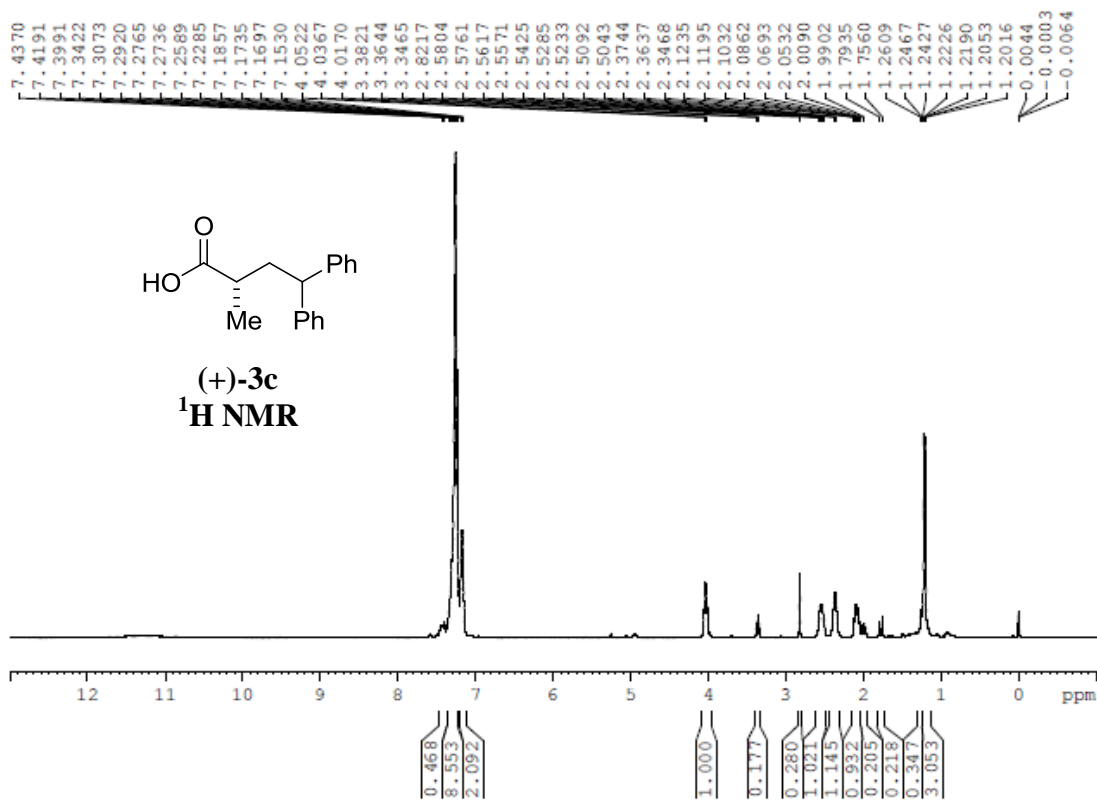


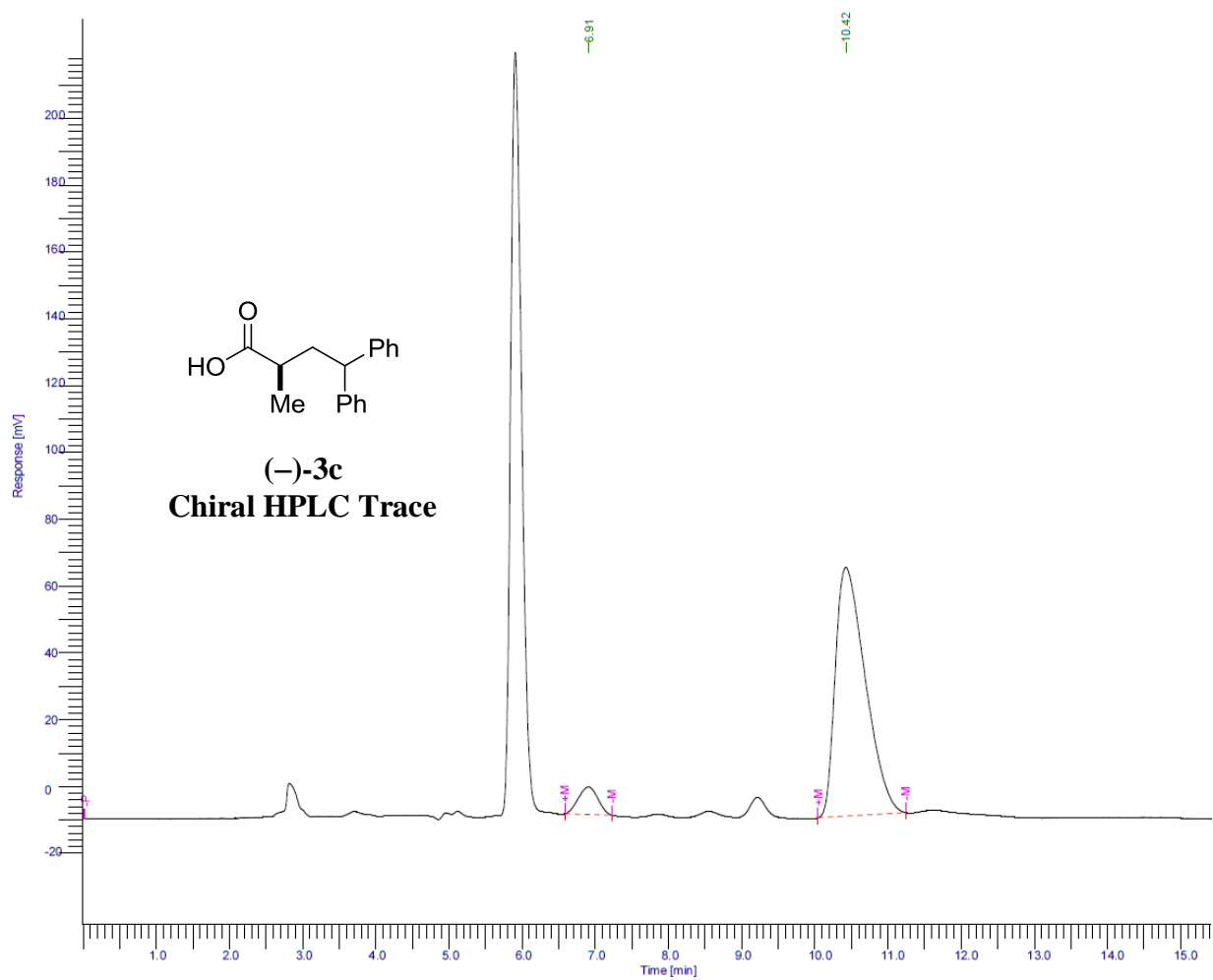


Peak #	Time [min]	Area [μV·s]	Height [μV]	Area [%]	Norm. Area [%]	BL	Area/Height [s]
1	6.911	961556.78	50919.15	61.81	61.81	*BB	18.8840
2	10.635	594066.34	23230.70	38.19	38.19	*BB	25.5725
		1555623.12	74149.85	100.00	100.00		

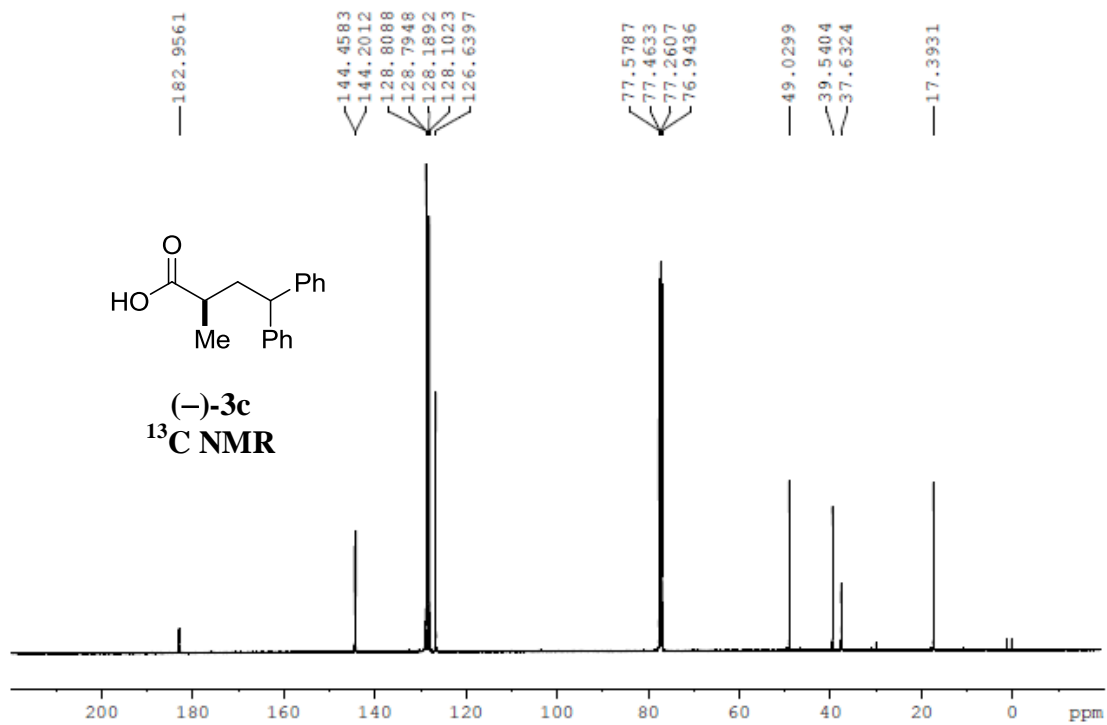
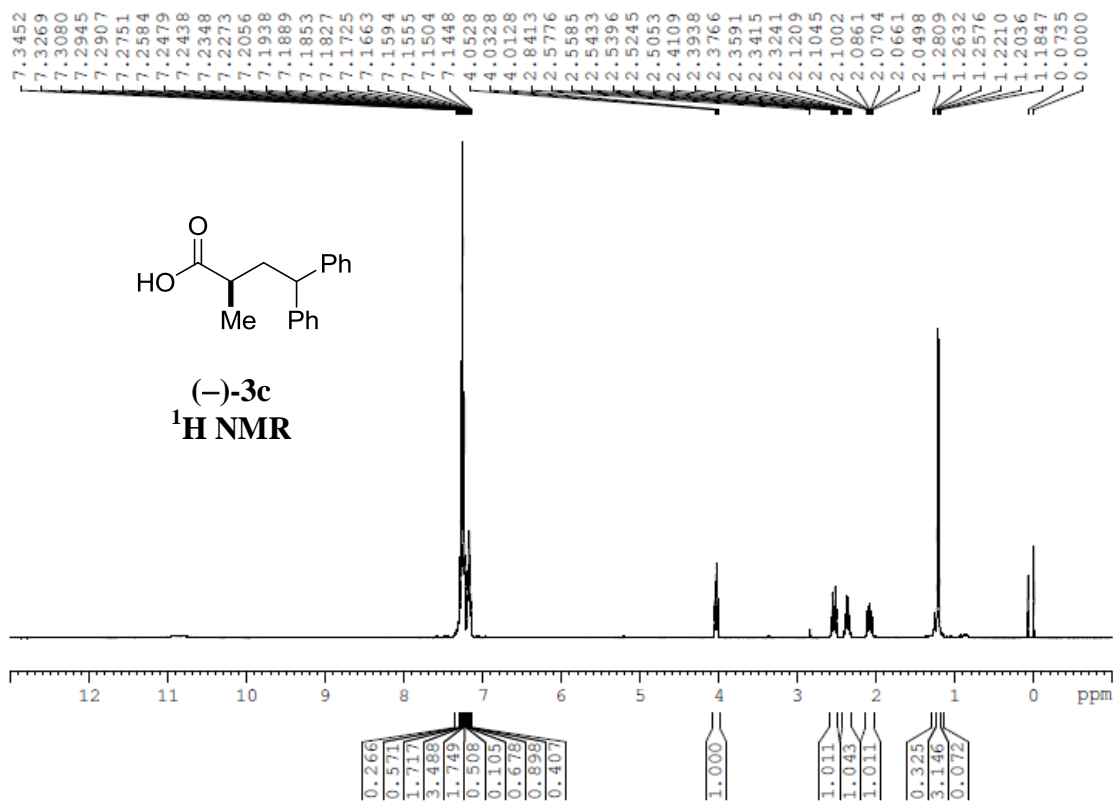


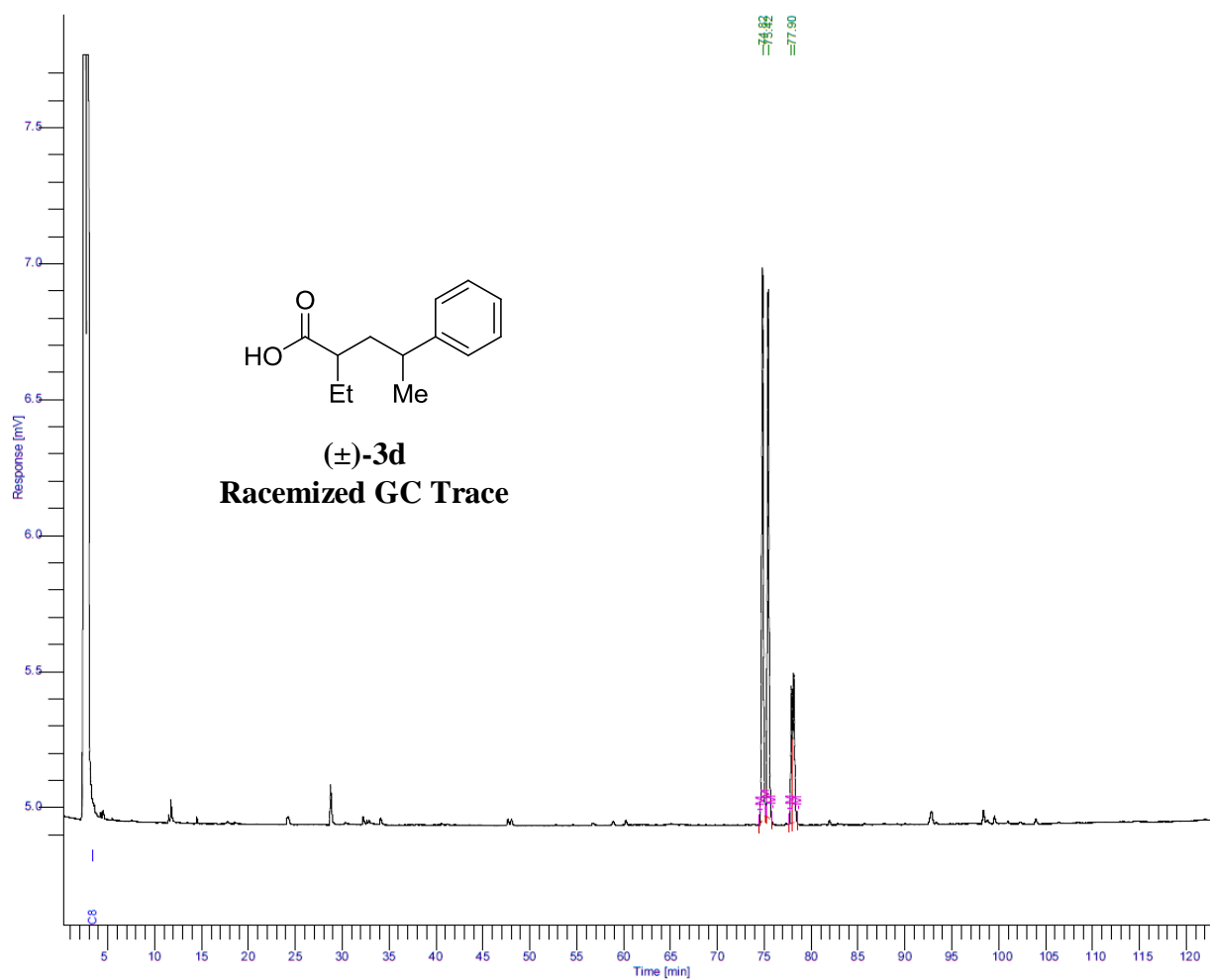
Peak #	Time [min]	Area [$\mu\text{V}\cdot\text{s}$]	Height [μV]	Area [%]	Norm. Area [%]	BL	Area/Height [s]
1	6.767	3974567.07	225869.27	96.81	96.81	*BB	17.5968
2	10.464	131120.36	5636.99	3.19	3.19	*BB	23.2607
		4105687.43	231506.25	100.00	100.00		



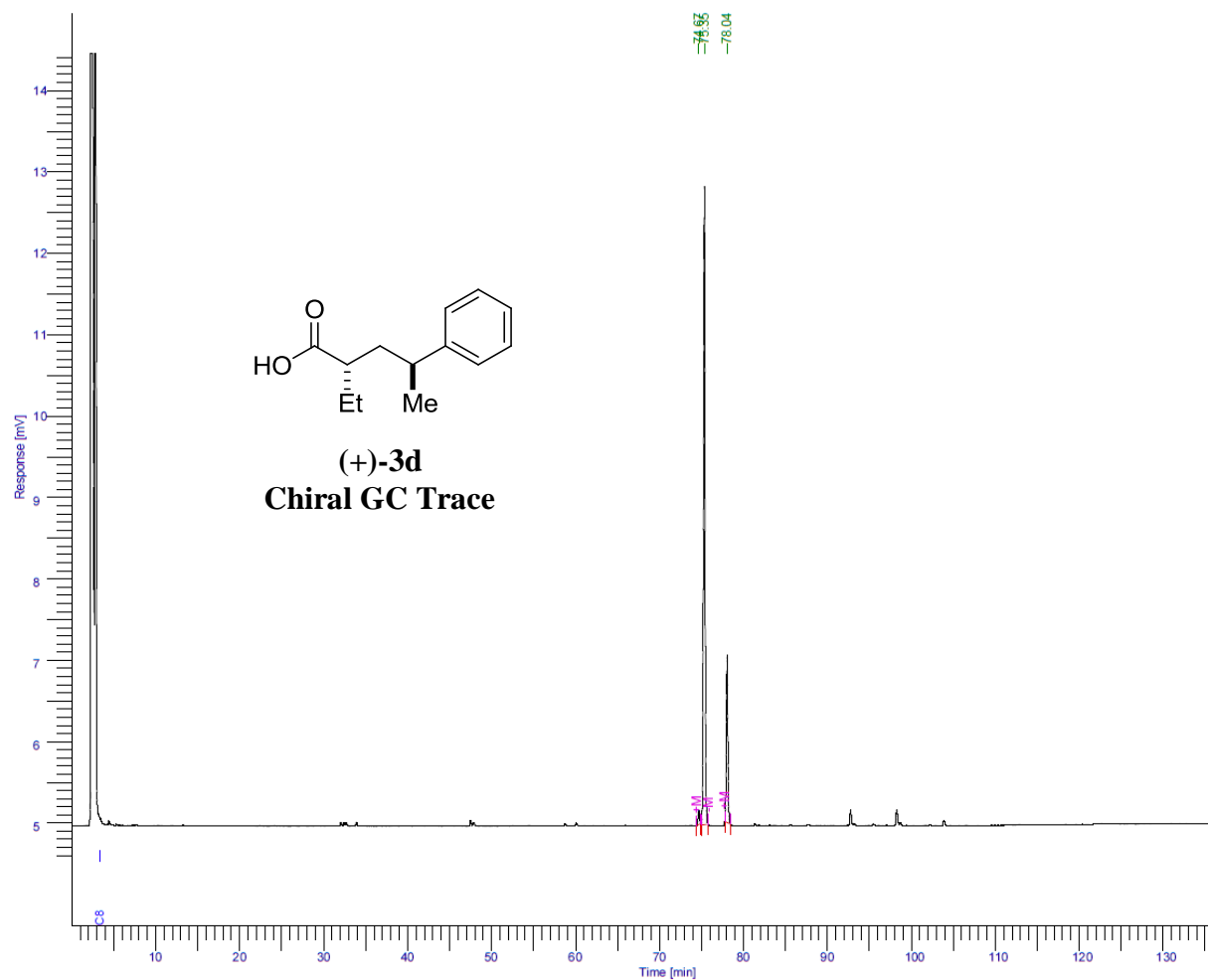


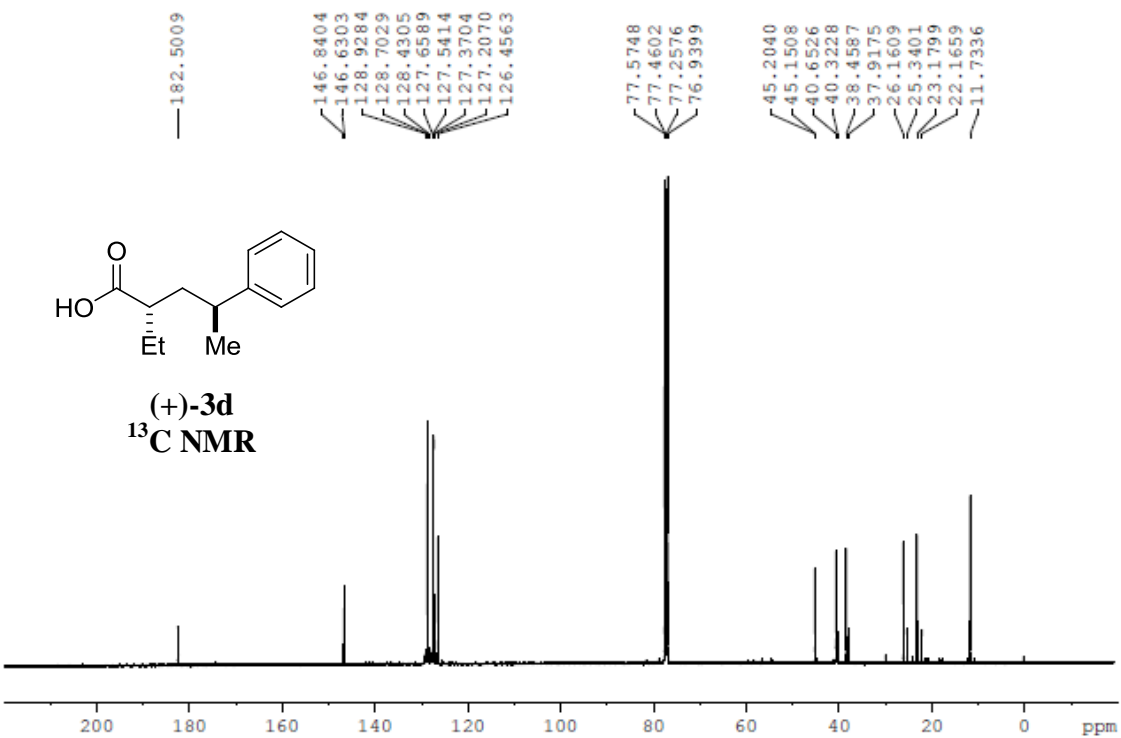
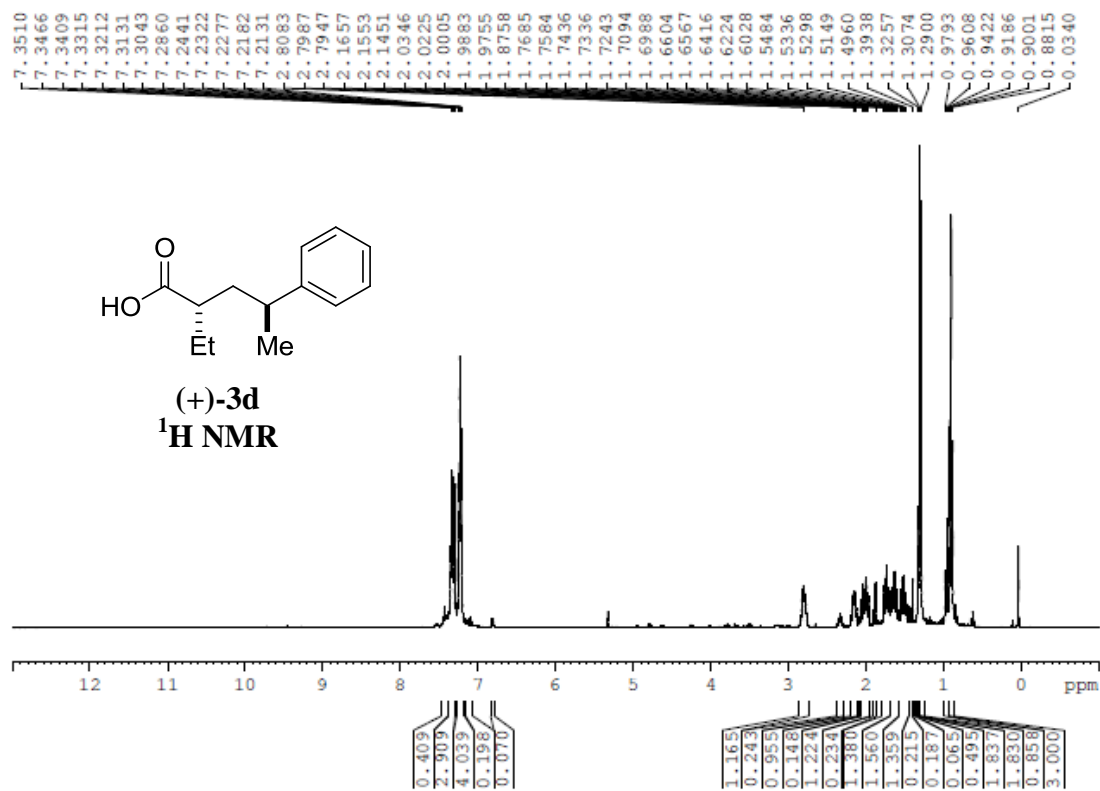
Peak #	Time [min]	Area [$\mu\text{V}\cdot\text{s}$]	Height [μV]	Area [%]	Norm. Area [%]	BL	Area/Height [s]
1	6.908	153218.60	8247.67	6.76	6.76	*BB	18.5772
2	10.424	2114518.87	74468.19	93.24	93.24	*BB	28.3949
		2267737.48	82715.86	100.00	100.00		

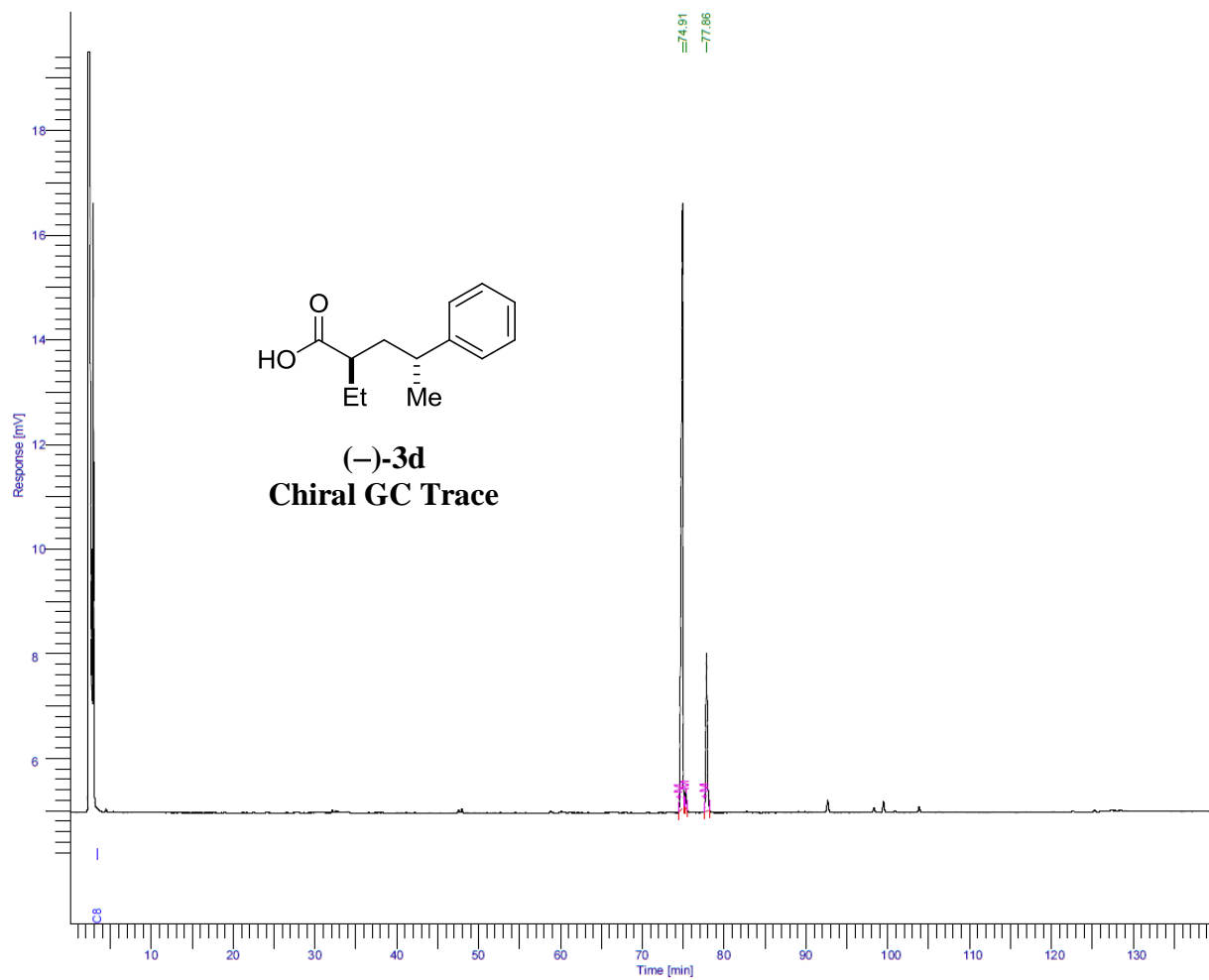




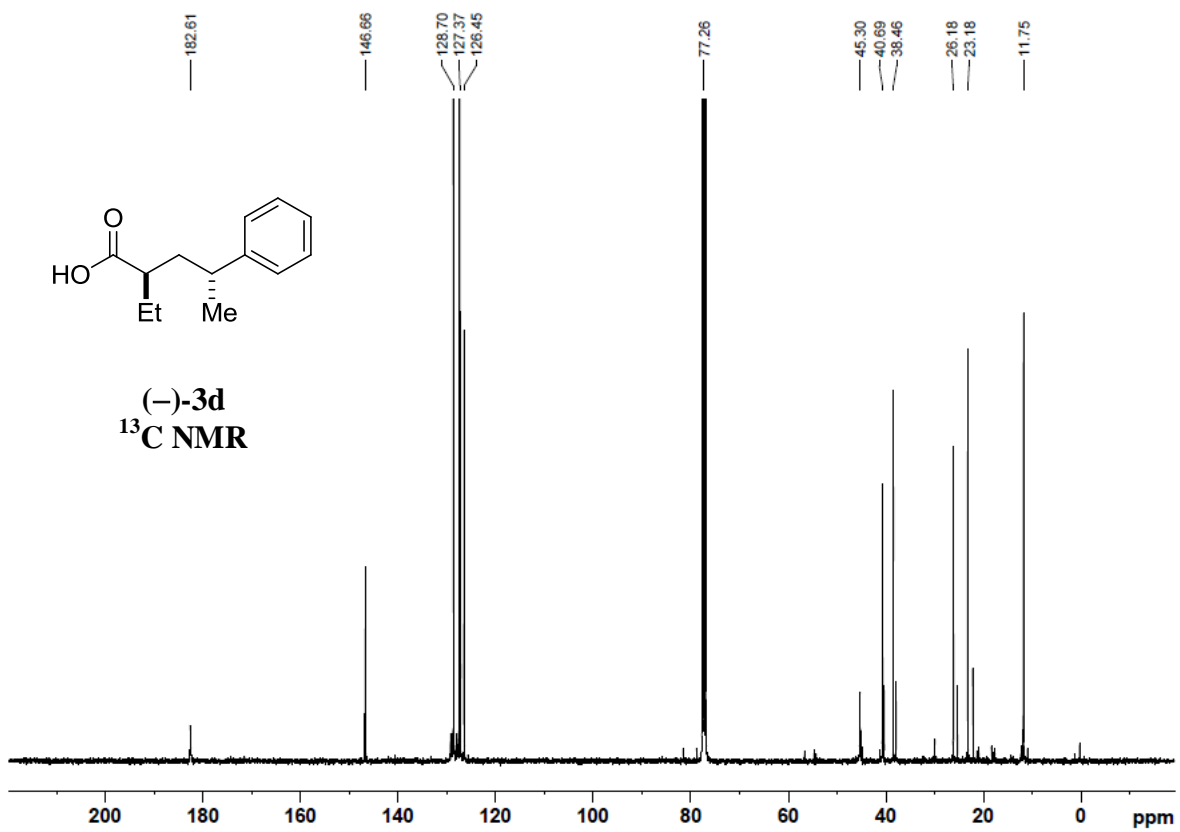
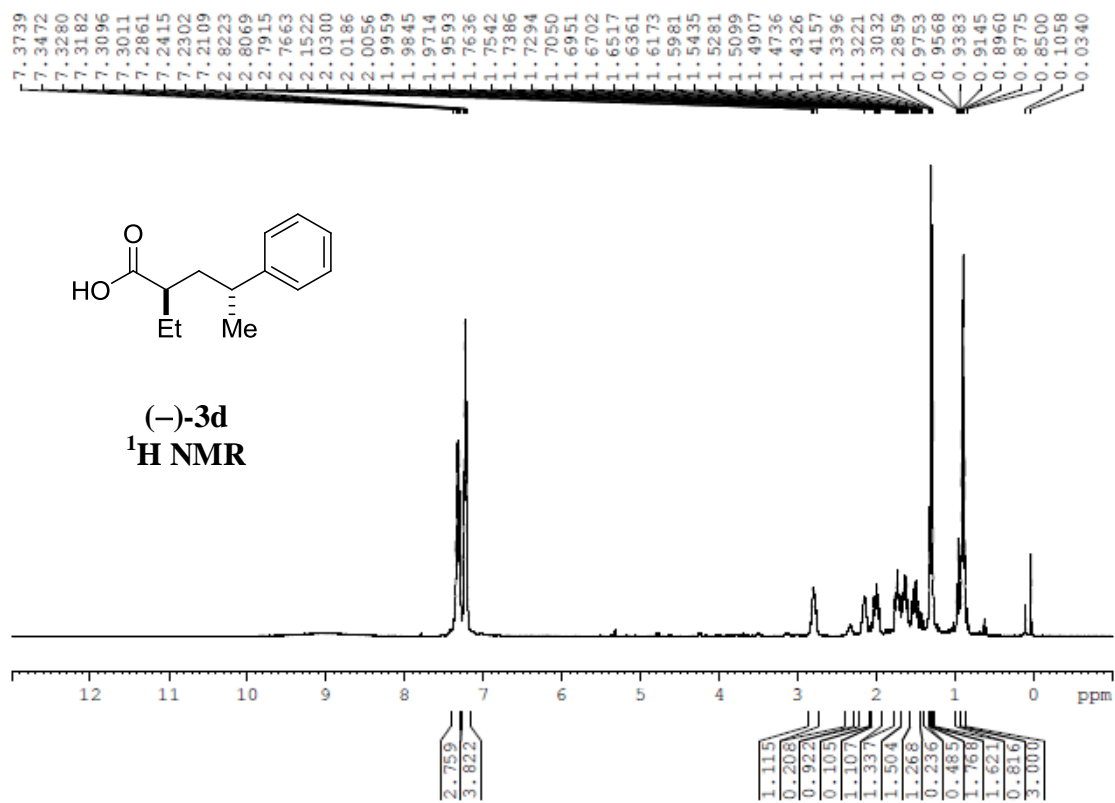
Peak #	Component Name	Time [min]	Area [uV*sec]	Height [uV]	Area/Amount	Raw Amount
1		74.821	25338.85	2005.23	-----	-----
2		75.422	24233.47	1940.78	1.0000e+06	0.0242
3		77.901	5493.04	503.46	1.0000e+06	0.0055
4		78.144	6951.18	546.45	1.0000e+06	0.0070
			62016.54	4995.92	3.0000e+06	0.0367

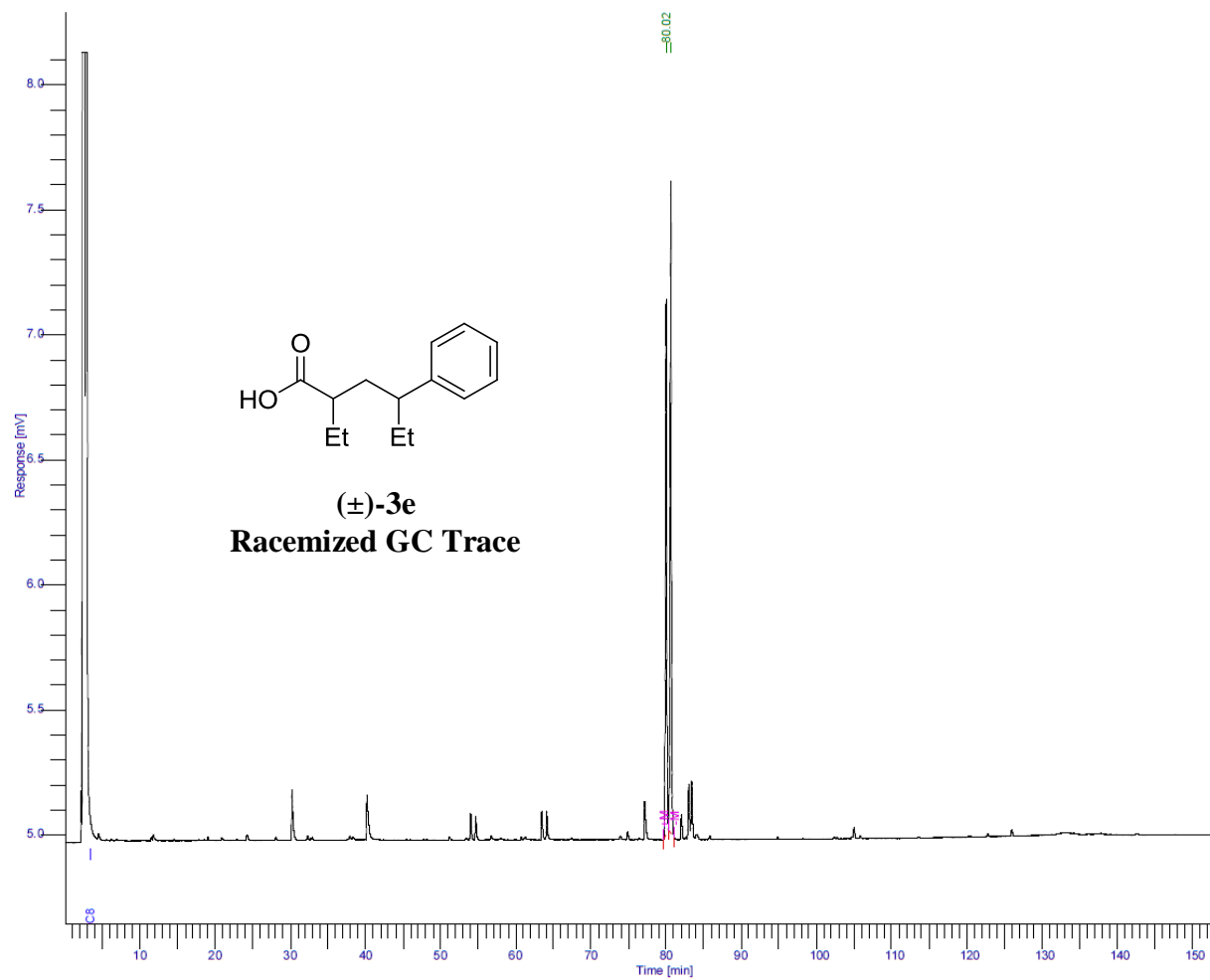




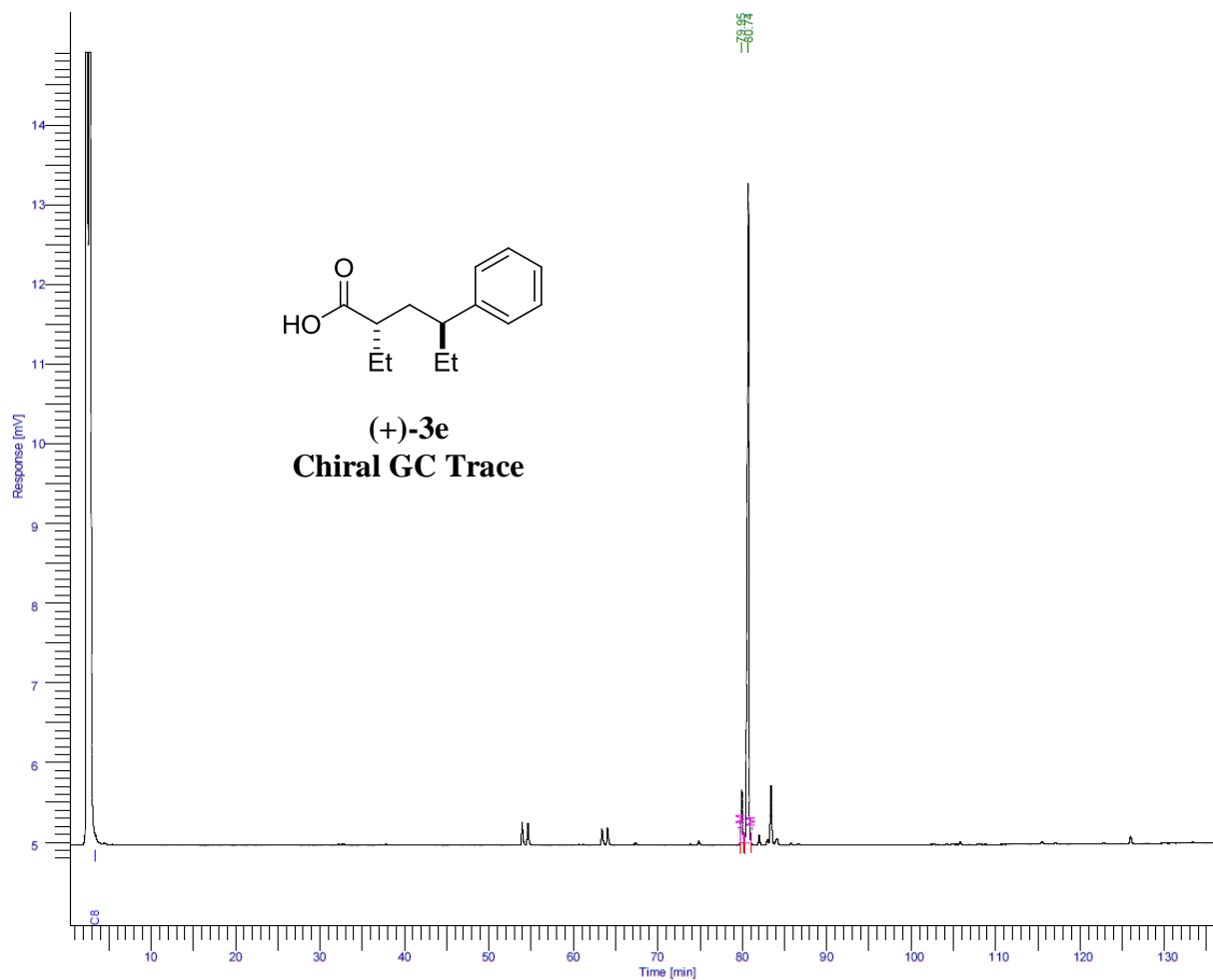


Peak #	Component Name	Time [min]	Area [uV*sec]	Height [uV]	Area/Amount	Raw Amount
1		74.907	155051.20	11553.34	-----	-----
2		75.312	3604.01	353.49	1.0000e+06	0.0036
3		77.858	37885.79	2993.85	1.0000e+06	0.0379
			196540.99	14900.68	2.0000e+06	0.0415

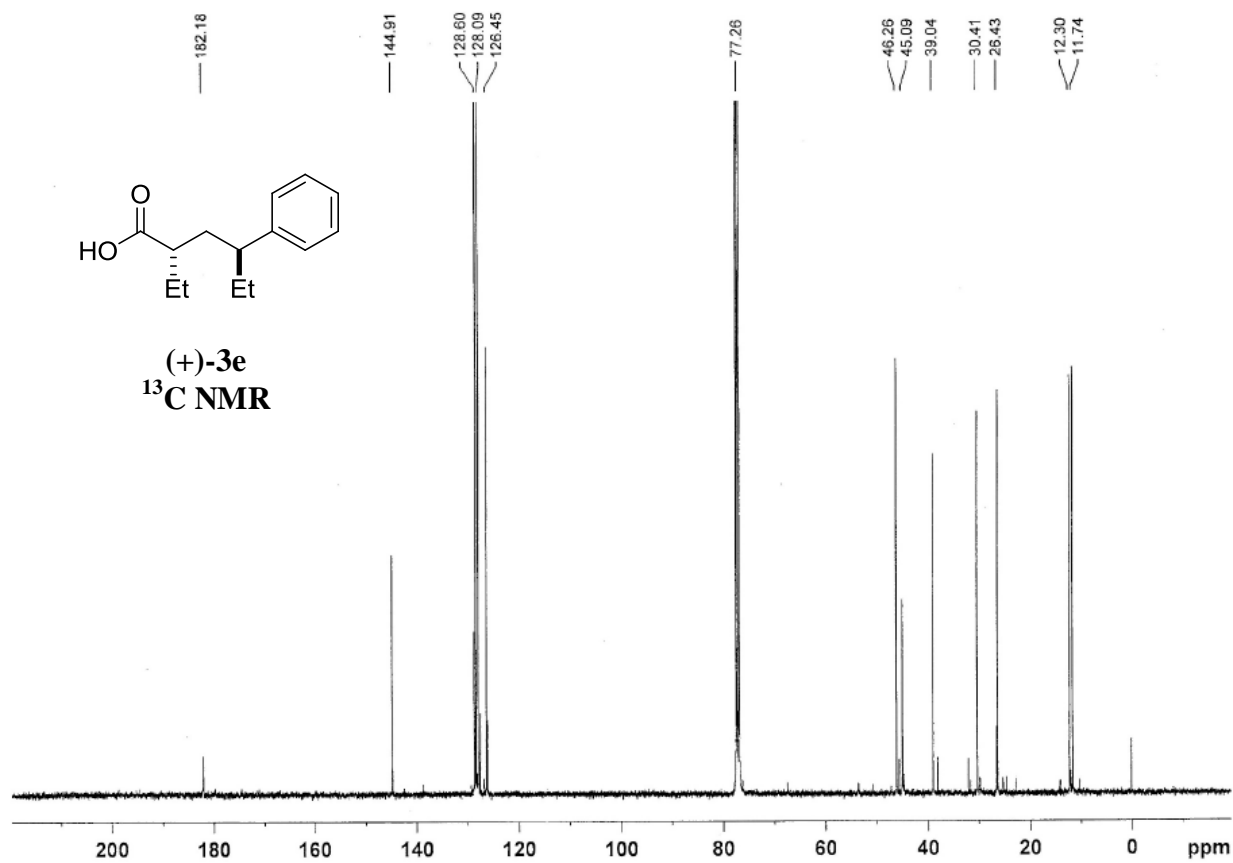
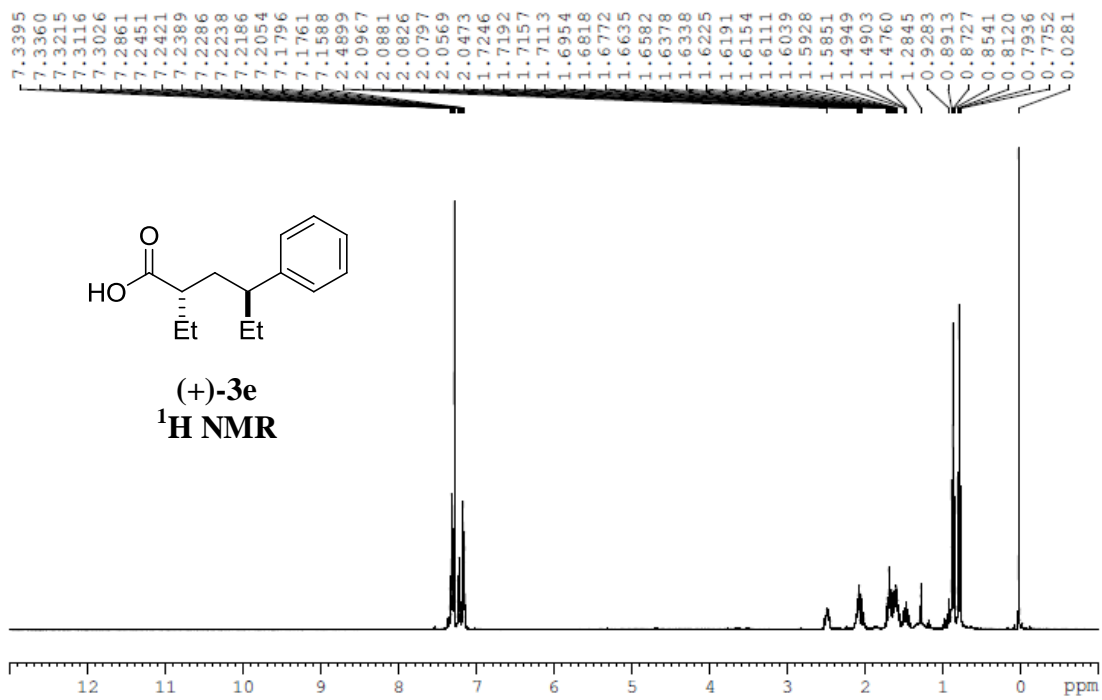


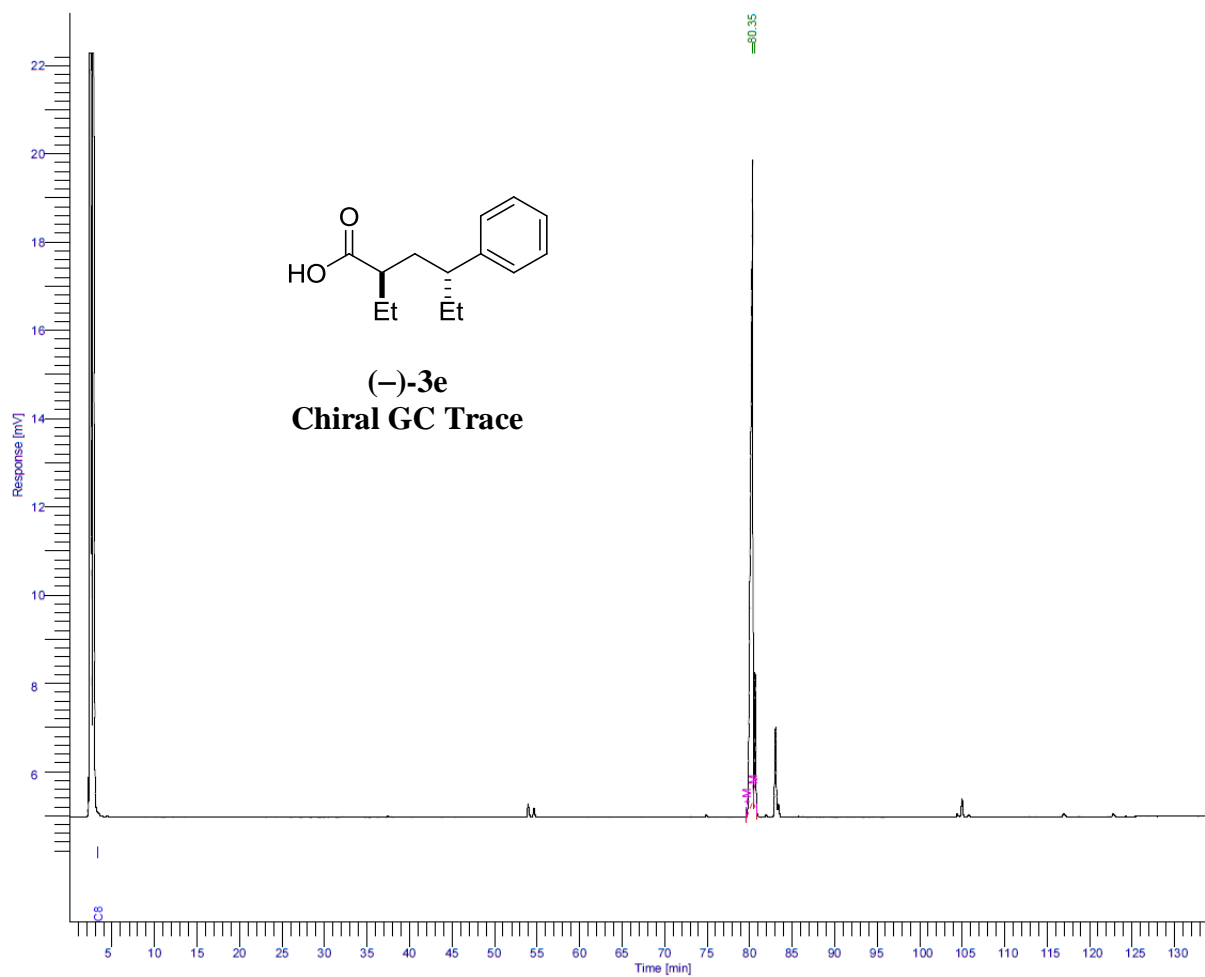


Peak #	Component Name	Time [min]	Area [uV*sec]	Height [uV]	Area/Amount	Raw Amount
1		80.016	26620.25	2141.17	-----	-----
2		80.630	32315.13	2599.14	1.0000e+06	0.0323
			58935.38	4740.31	1.0000e+06	0.0323

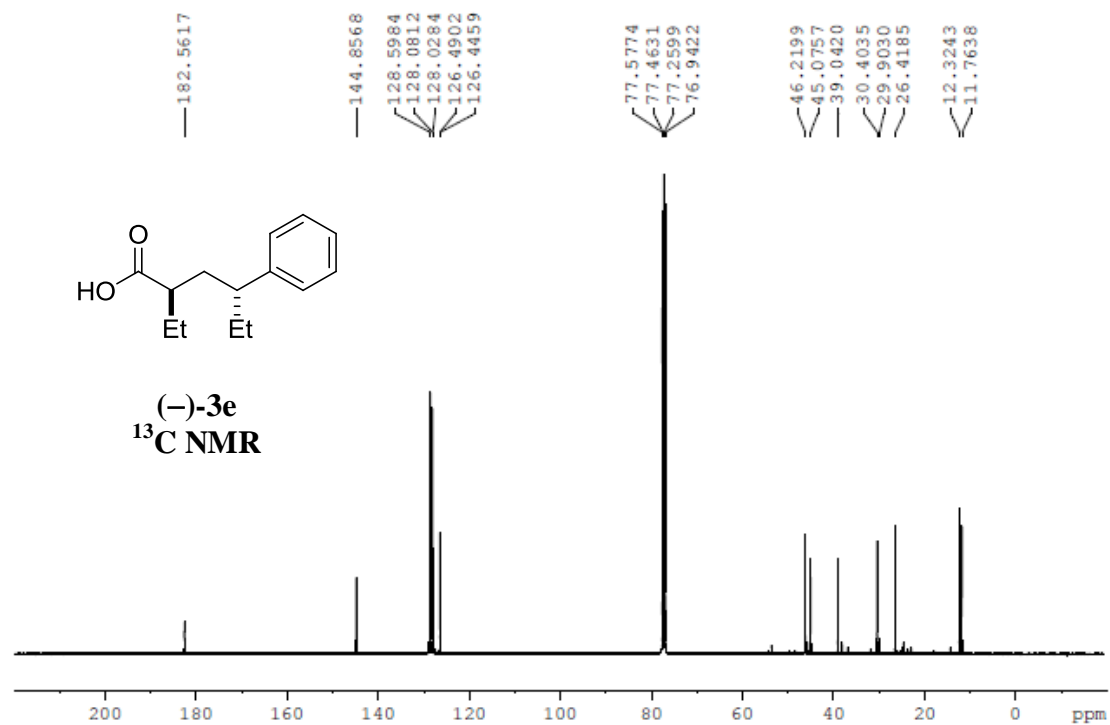
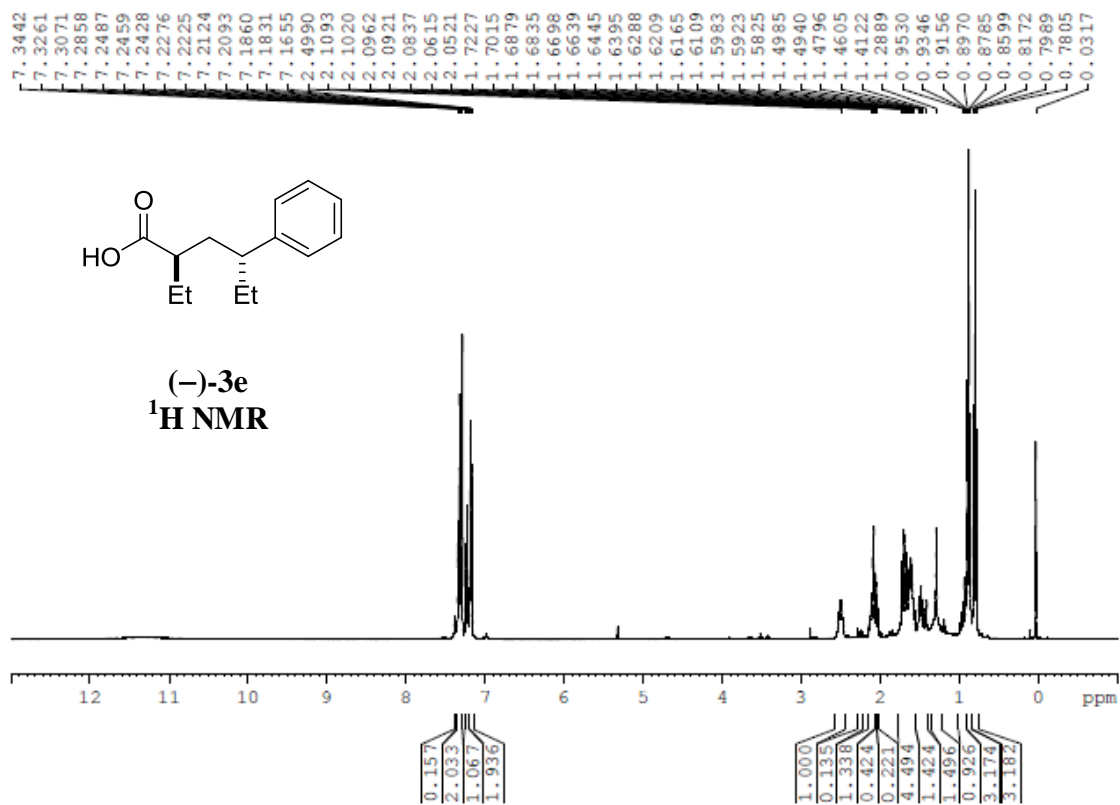


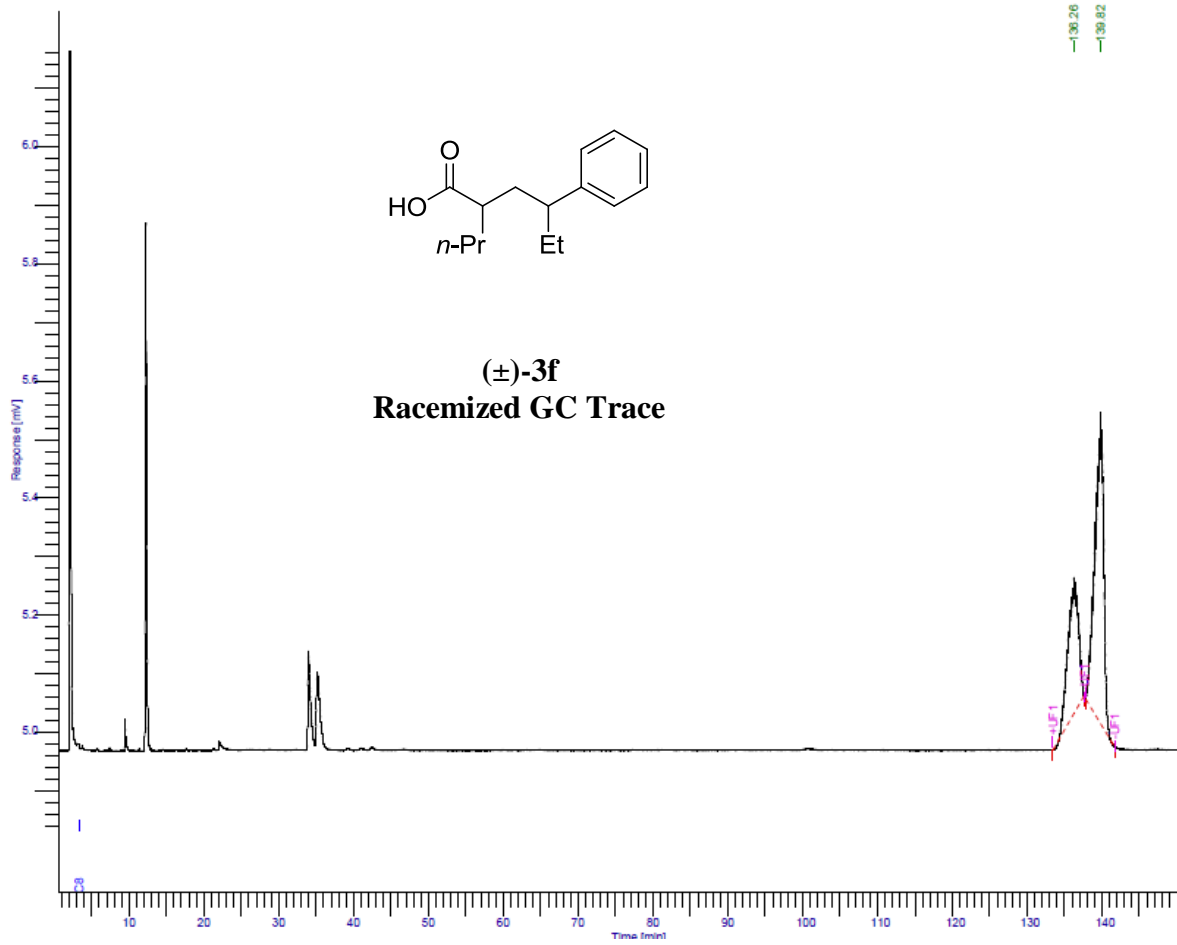
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1		79.947	8008.82	658.42	-----	-----
2		80.735	110535.93	8274.76	1.0000e+06	0.1105
			118544.74	8933.18	1.0000e+06	0.1105



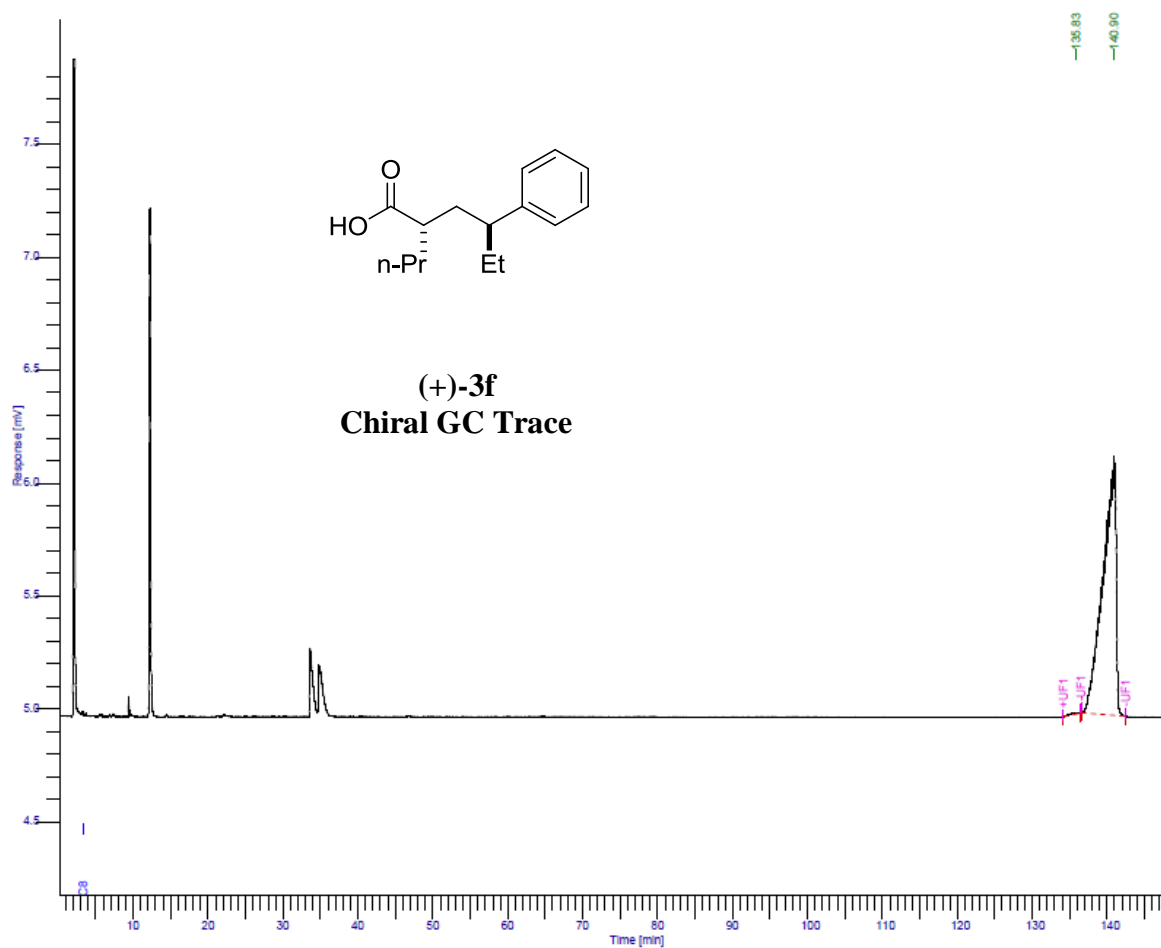


Peak #	Component Name	Time [min]	Area [uV*sec]	Height [uV]	Area/ Amount	Raw Amount
1		80.352	253358.70	14554.58	-----	-----
2		80.660	31291.65	3032.33	1.0000e+06	0.0313
			284650.35	17586.91	1.0000e+06	0.0313

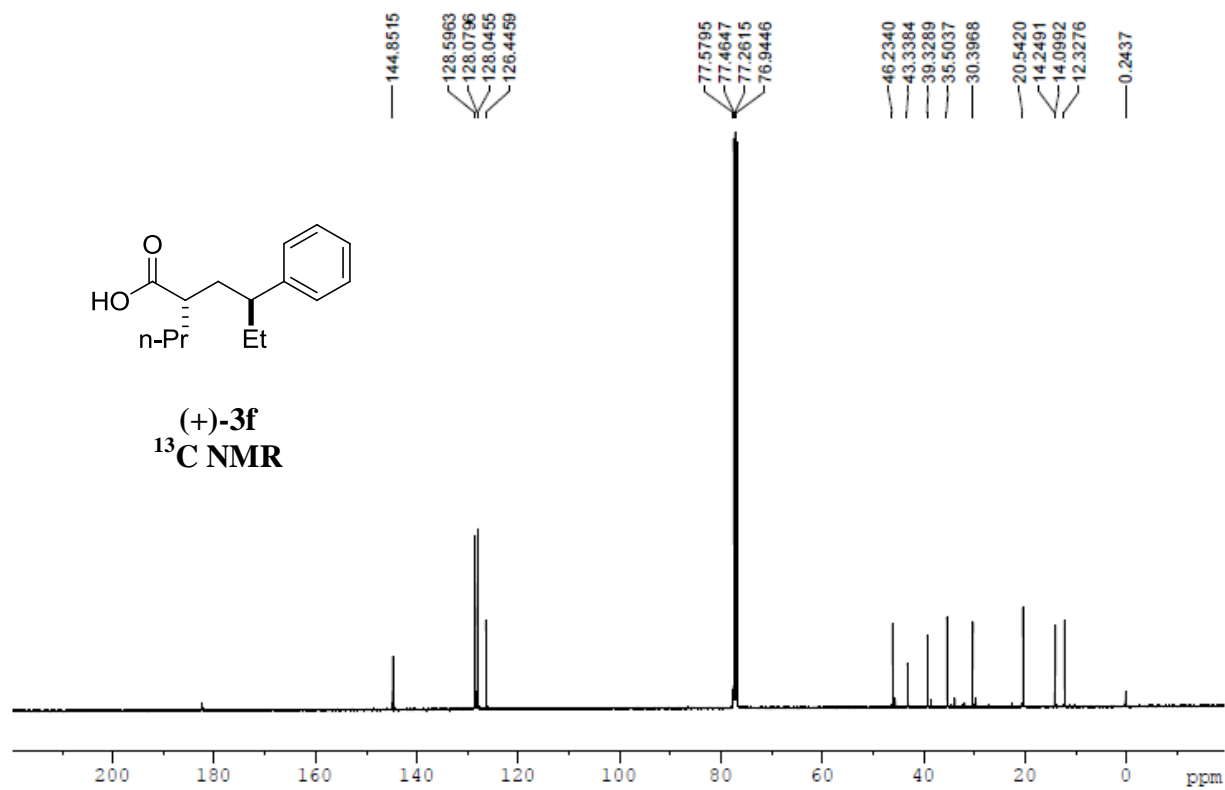
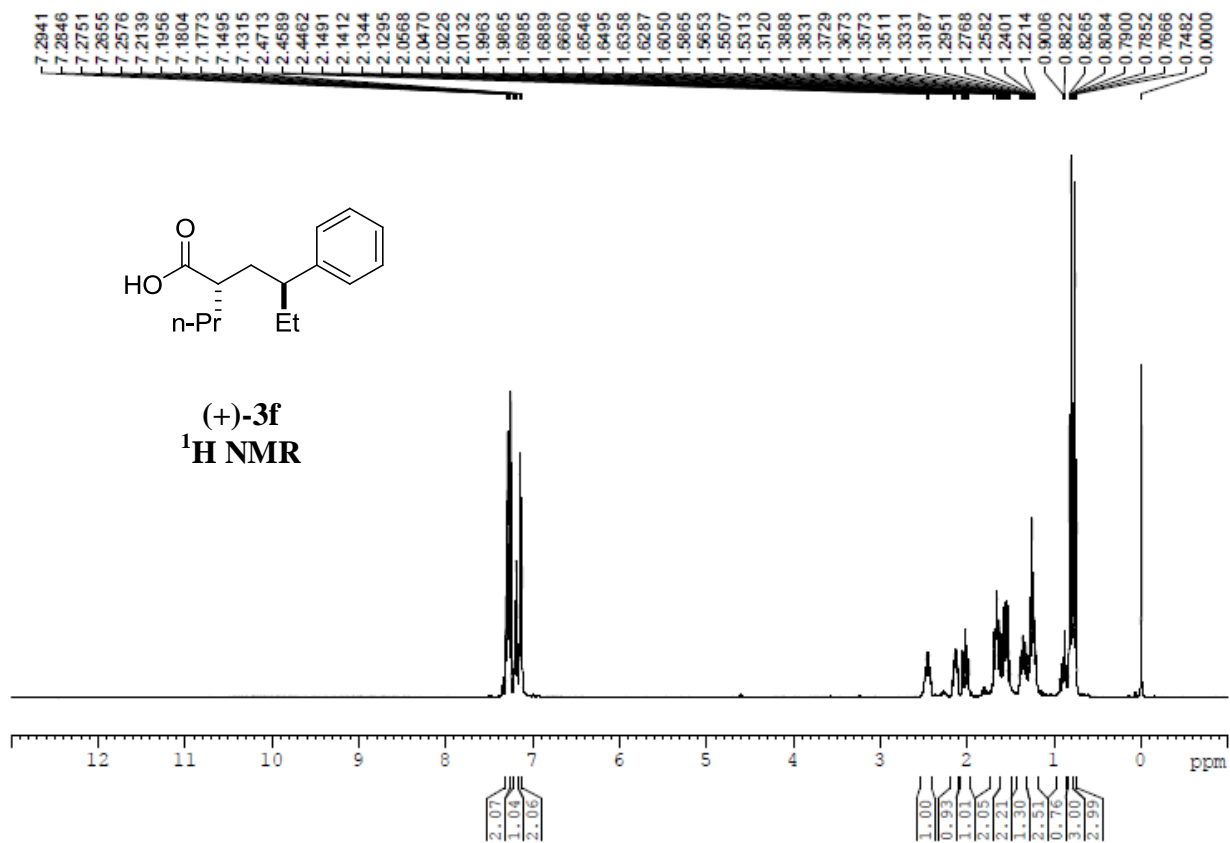


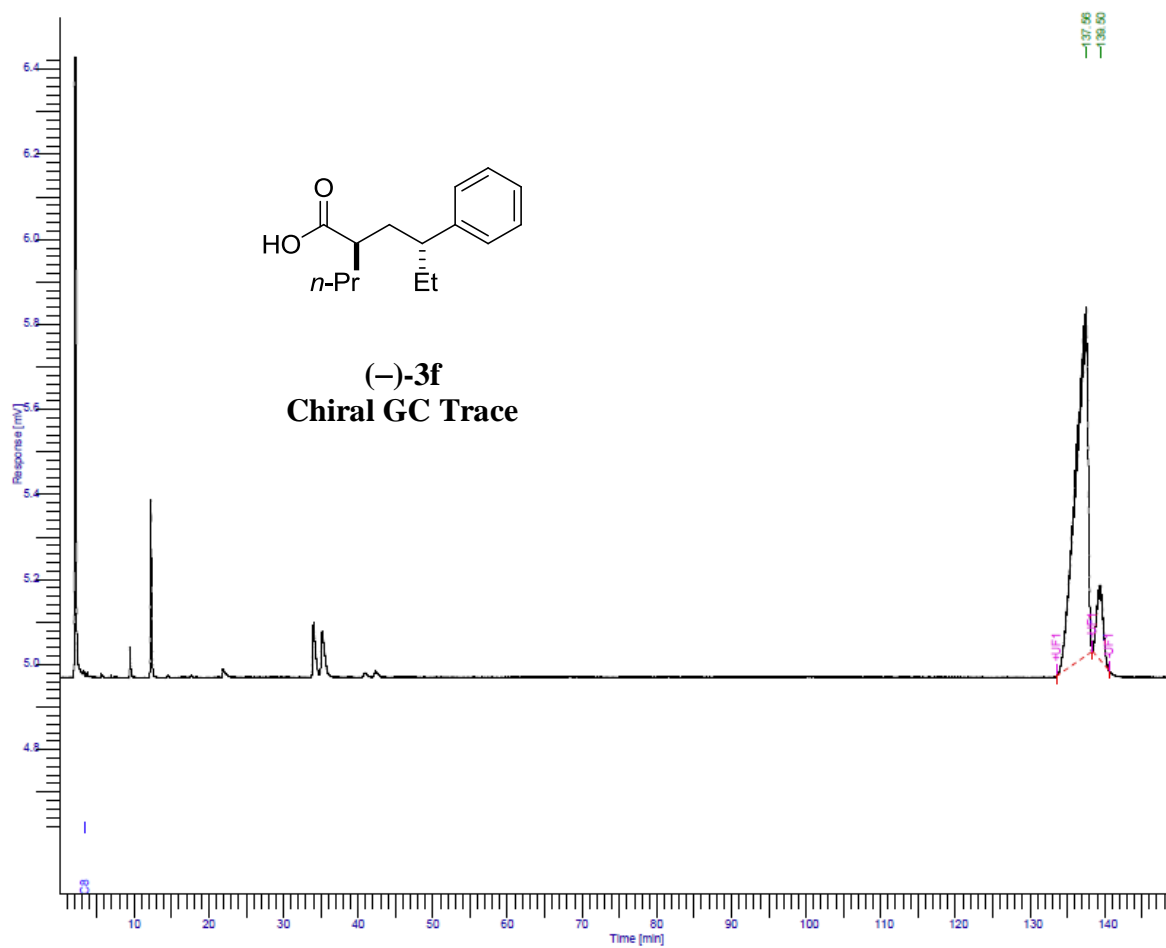


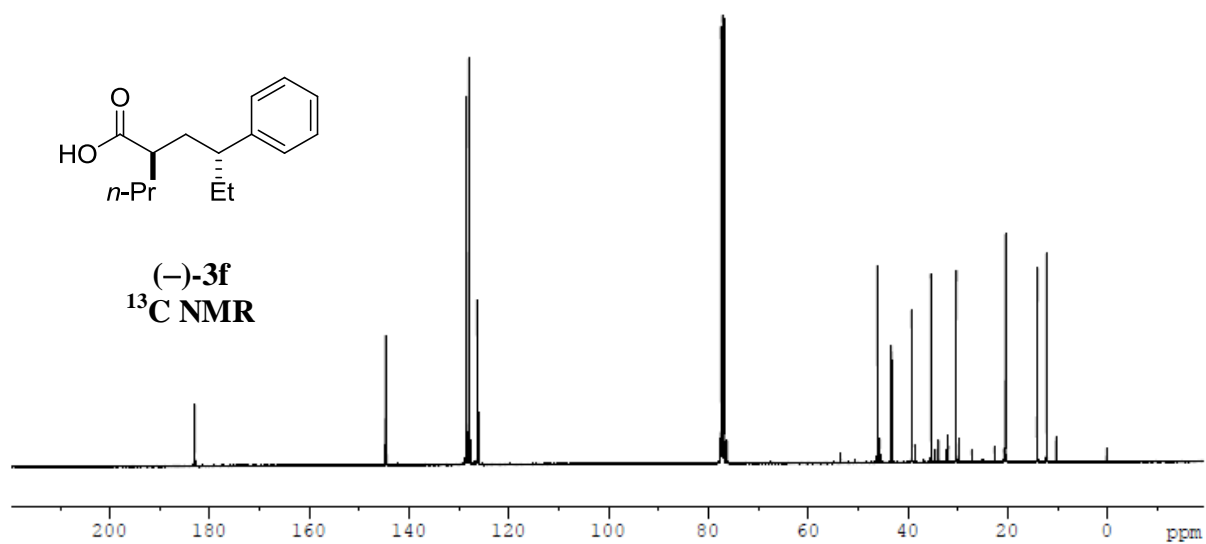
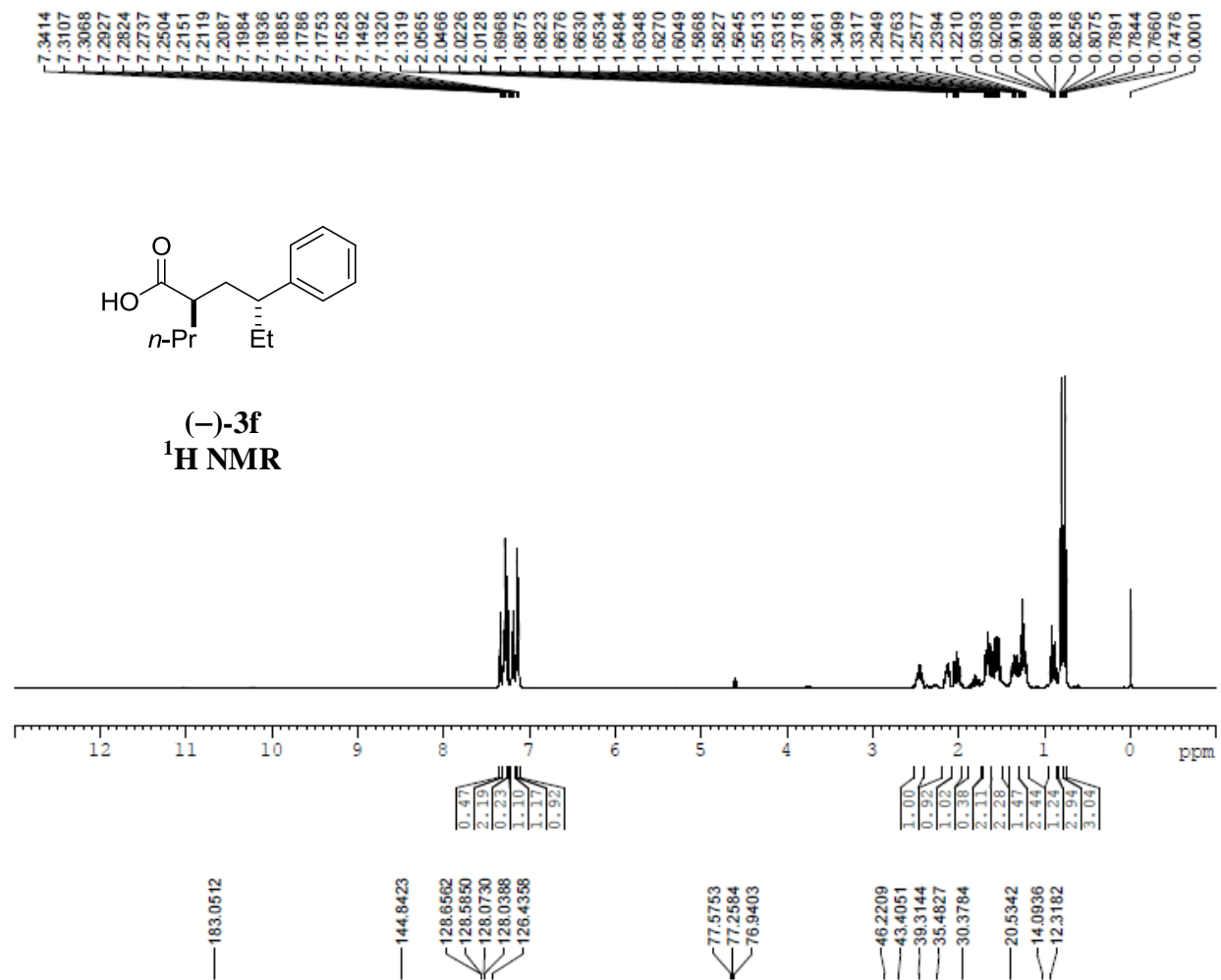
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1		136.261	21878.41	231.73	-----	-----
2		139.824	41686.81	530.19	1.0000e+06	0.0417
			63565.22	761.92	1.0000e+06	0.0417

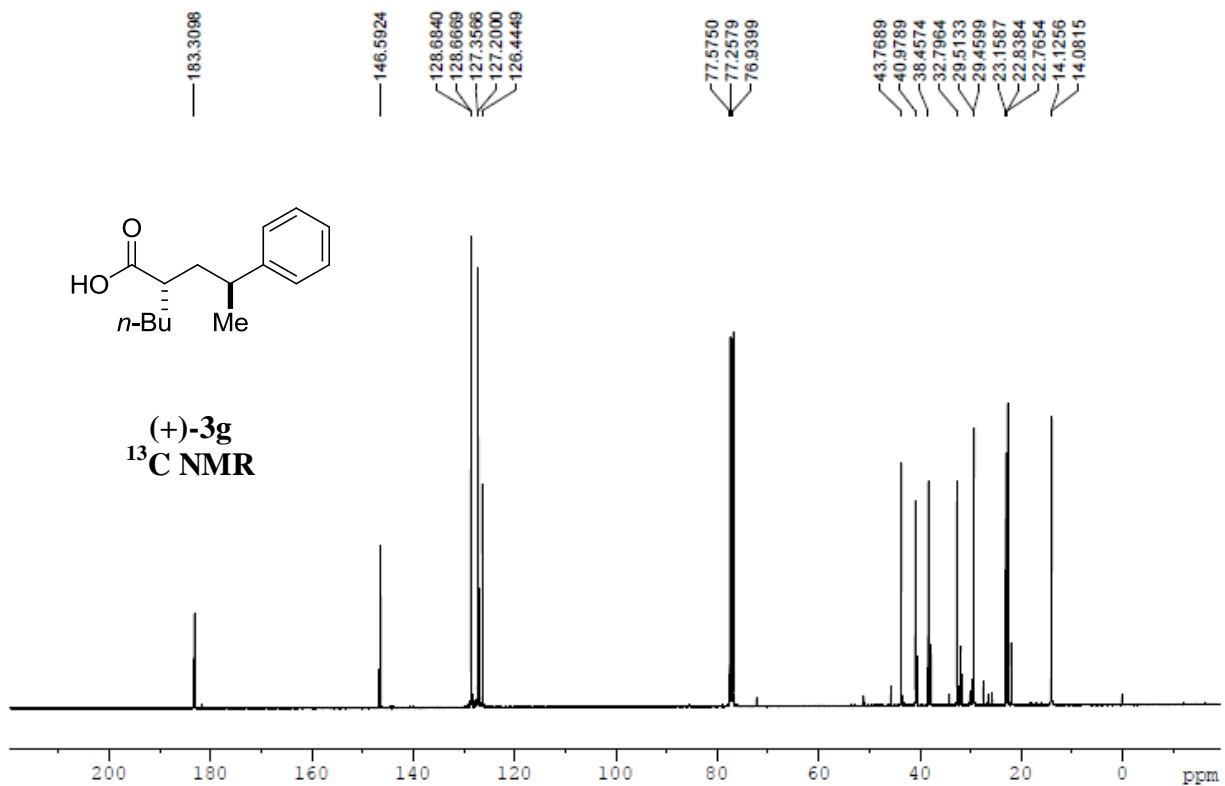
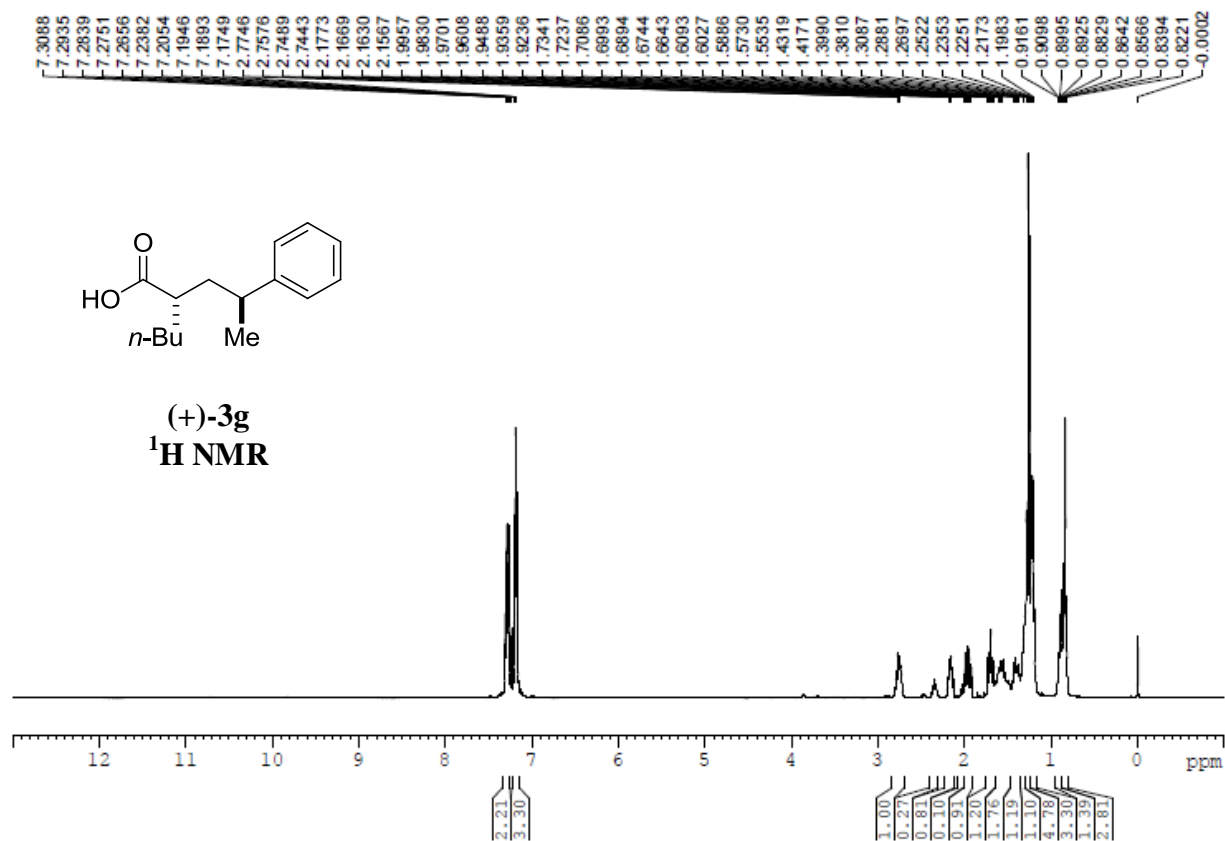


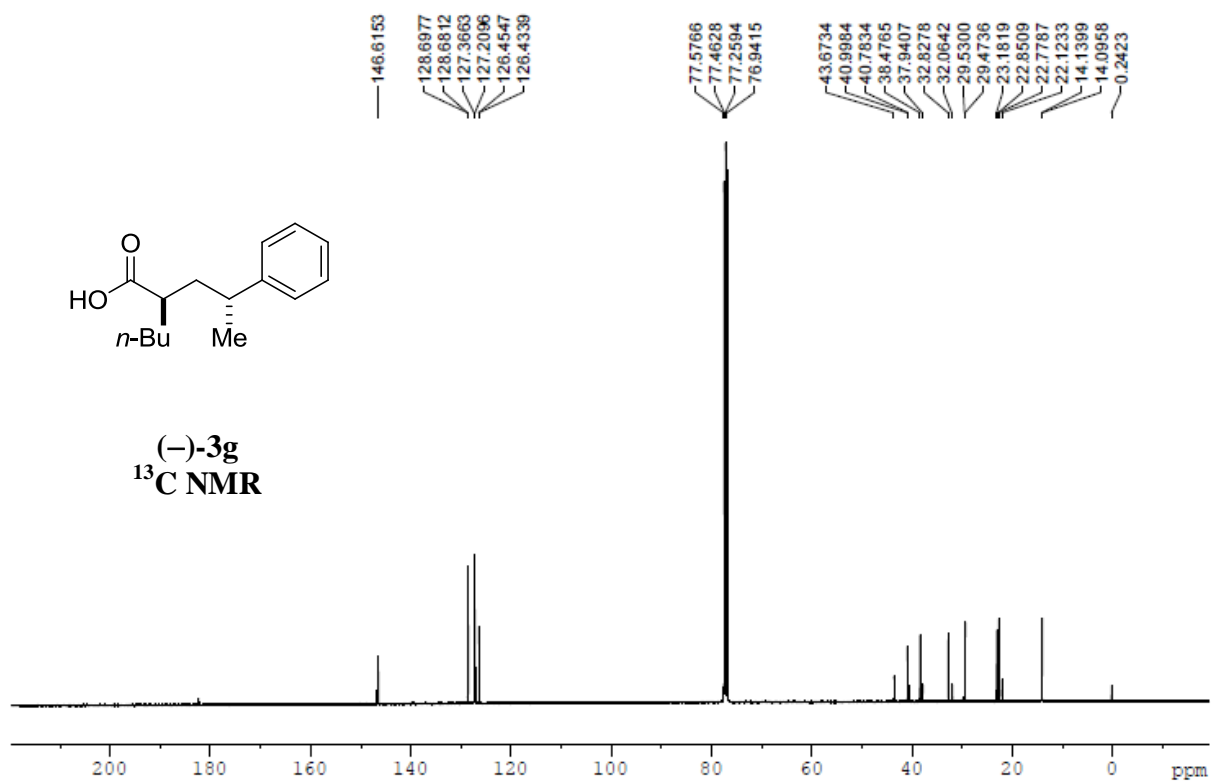
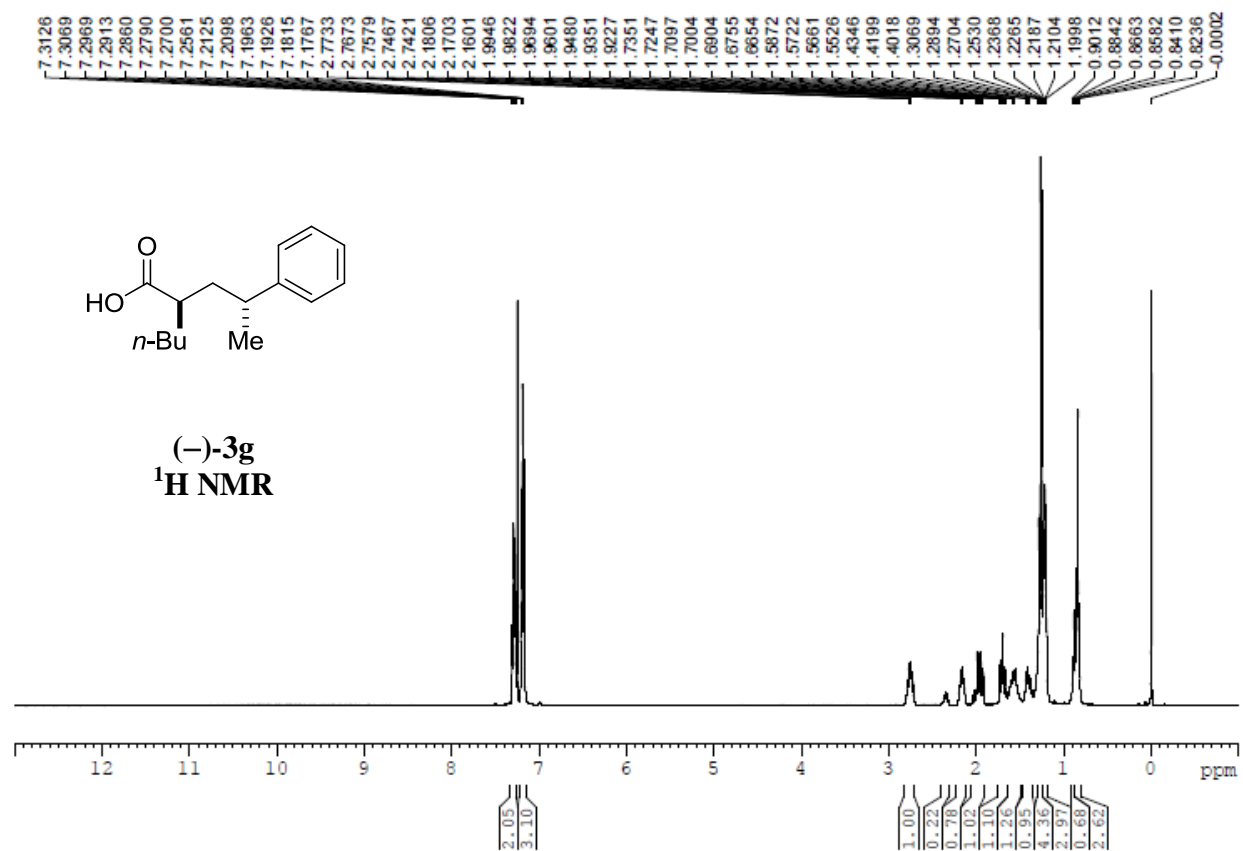
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1		135.835	488.12	6.36	-----	-----
2		140.896	135596.74	1145.43	1.0000e+06	0.1356
			136084.87	1151.78	1.0000e+06	0.1356

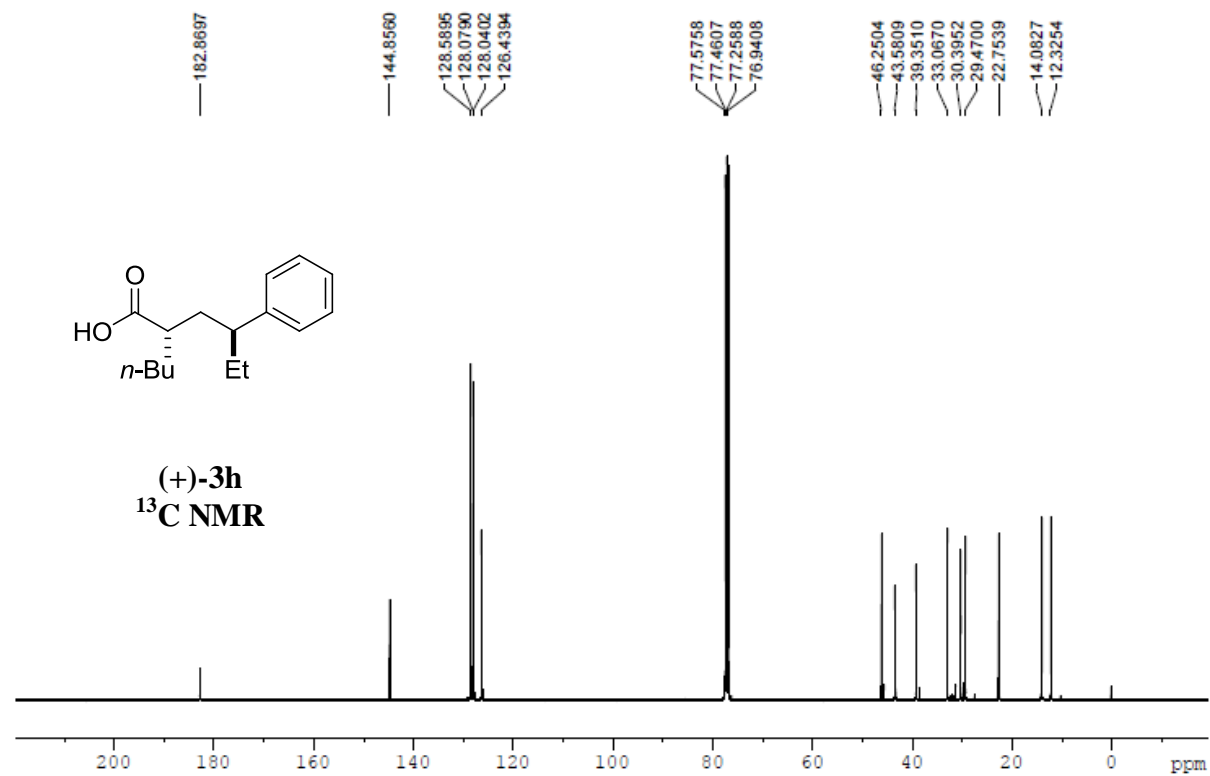
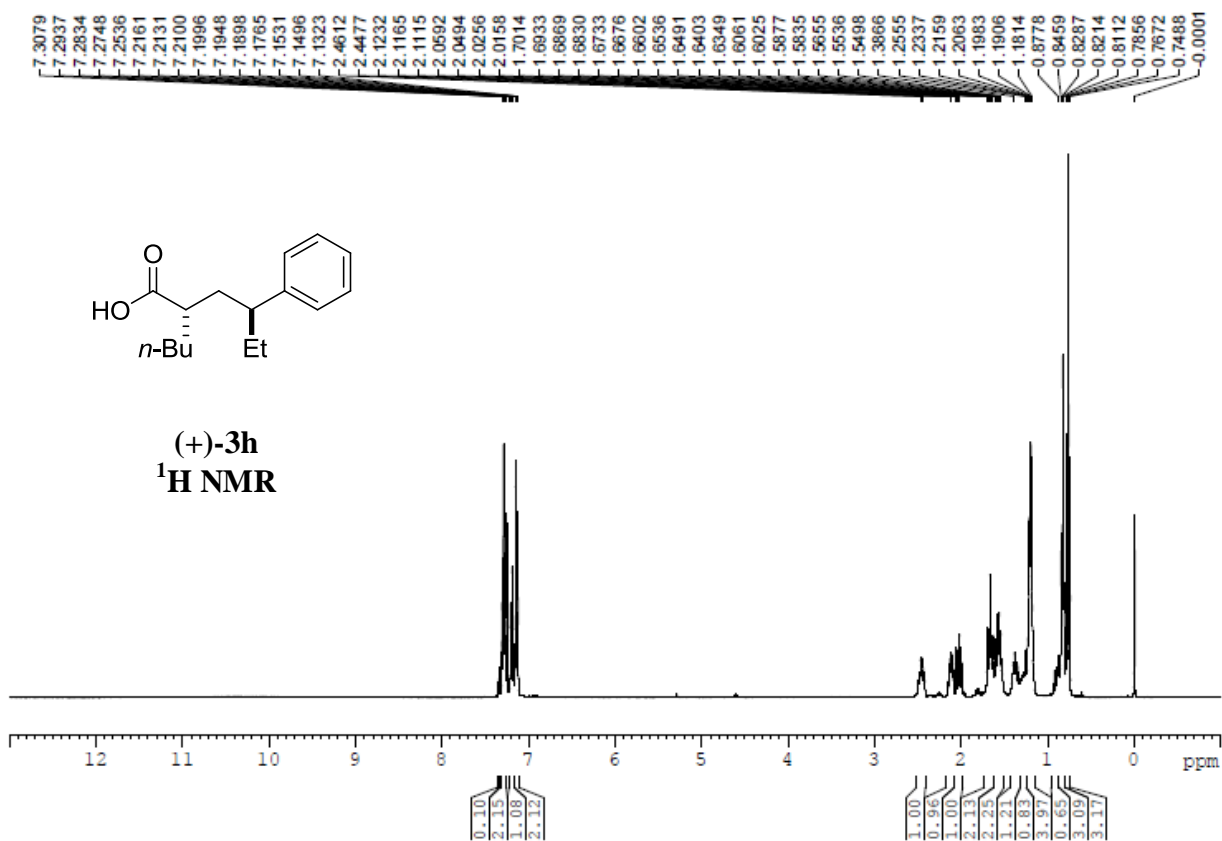


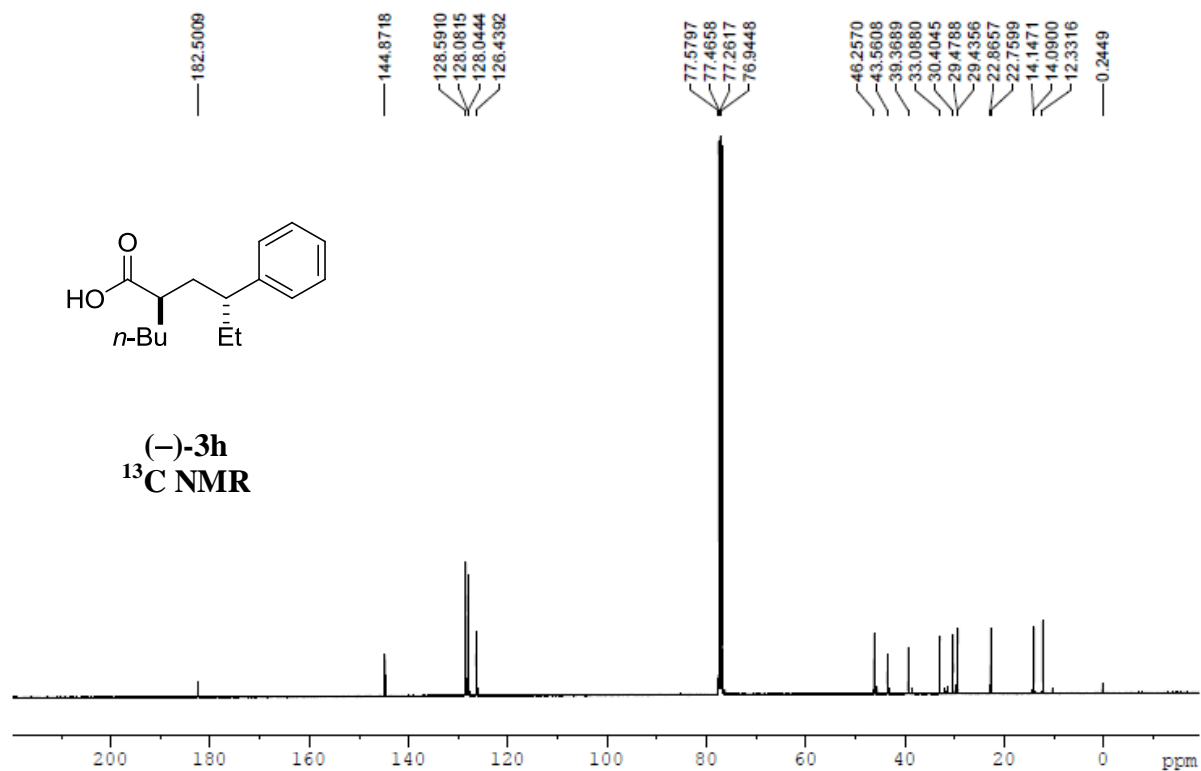
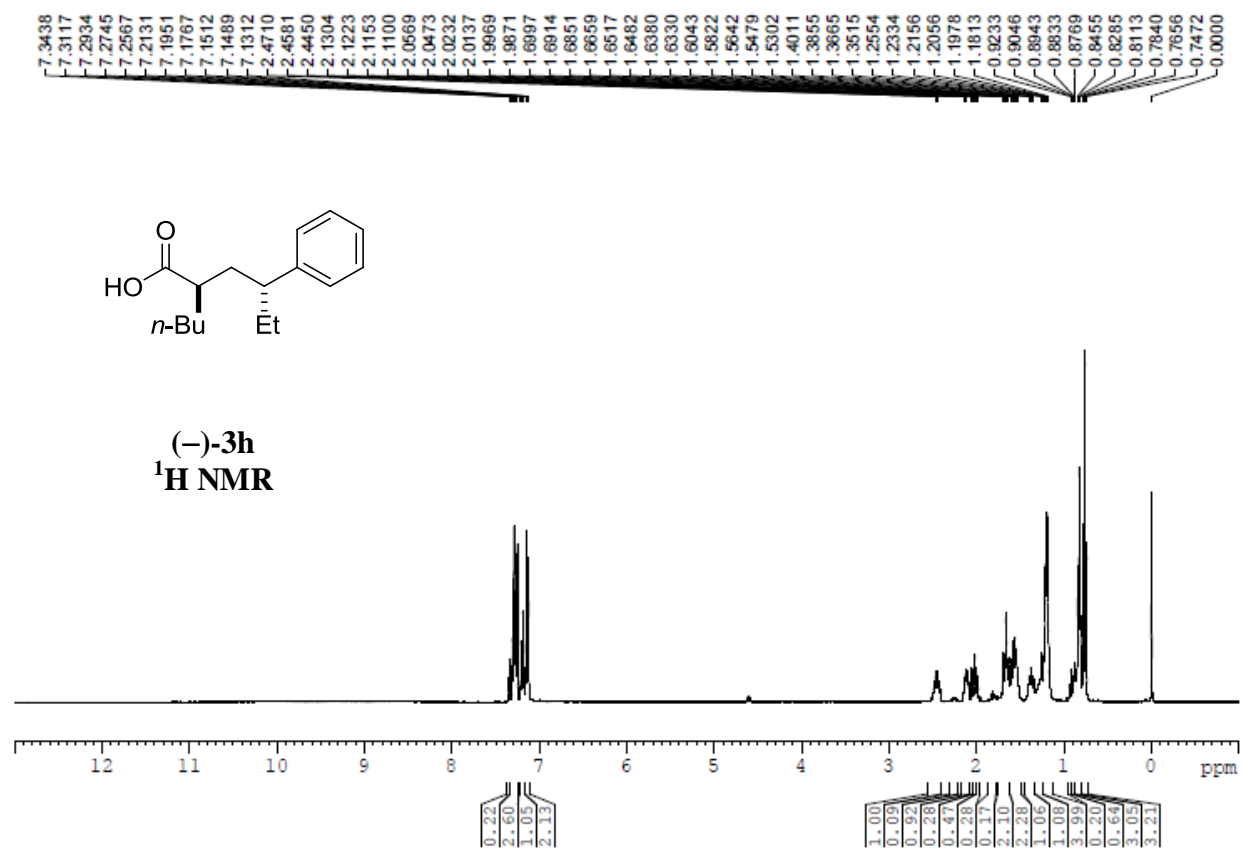


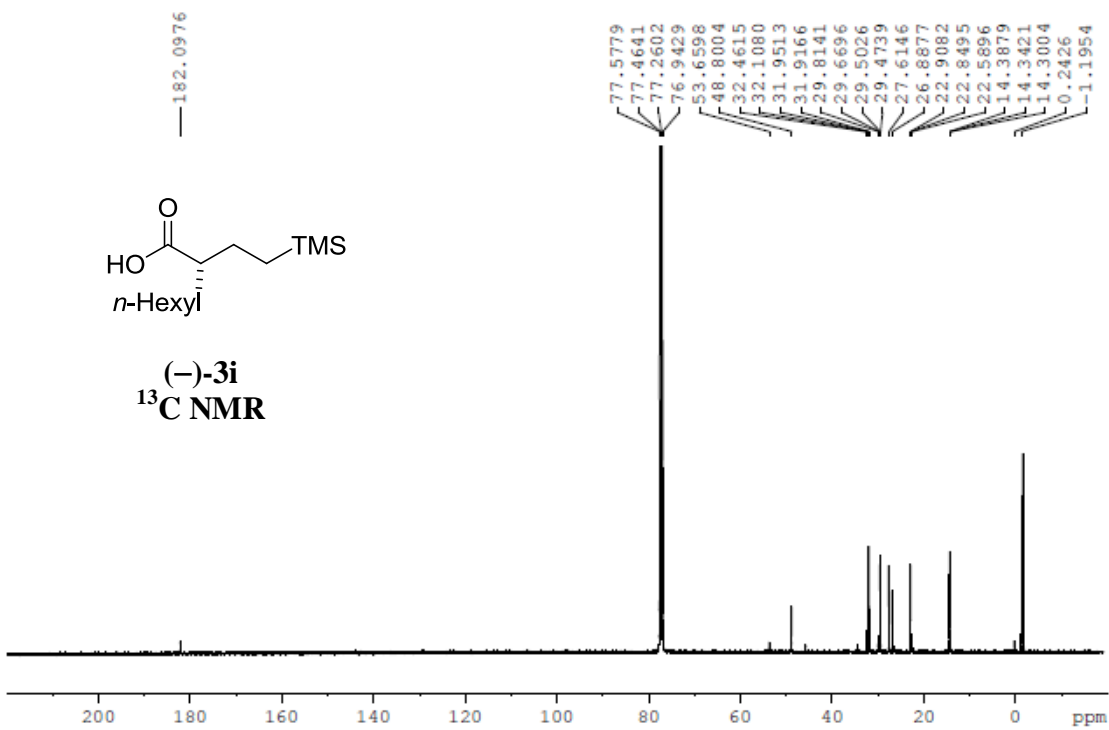
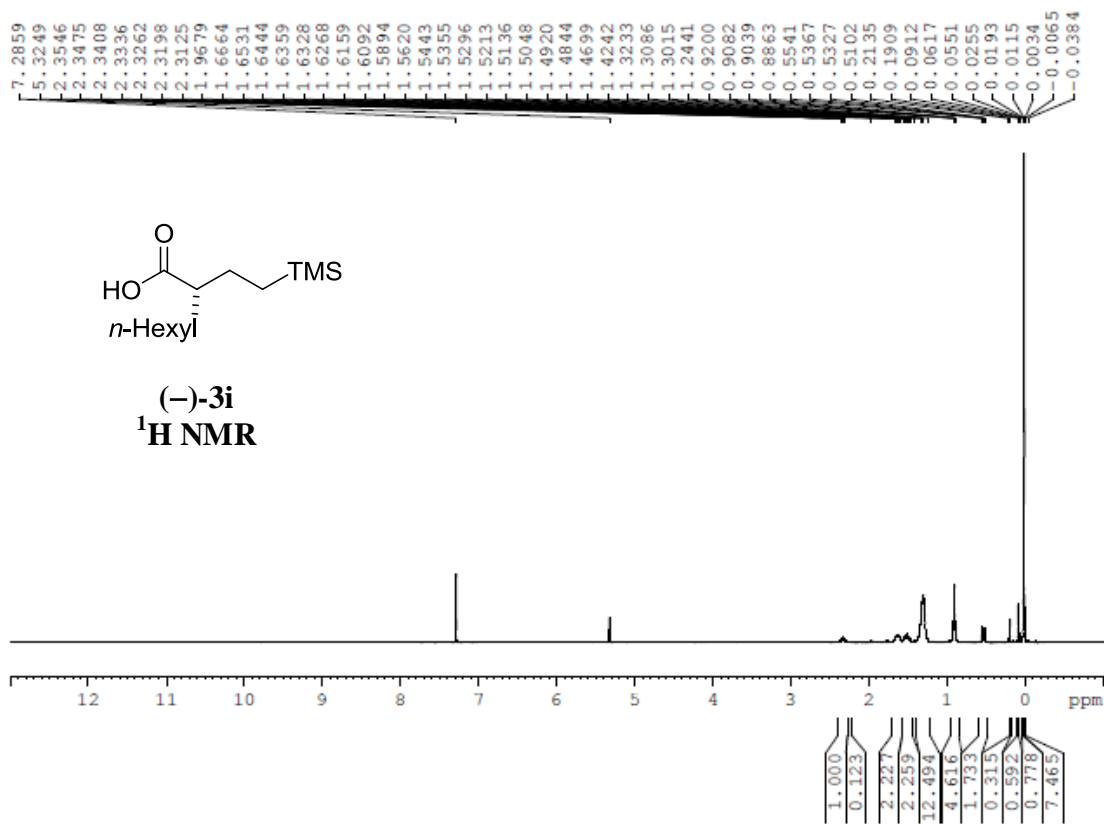


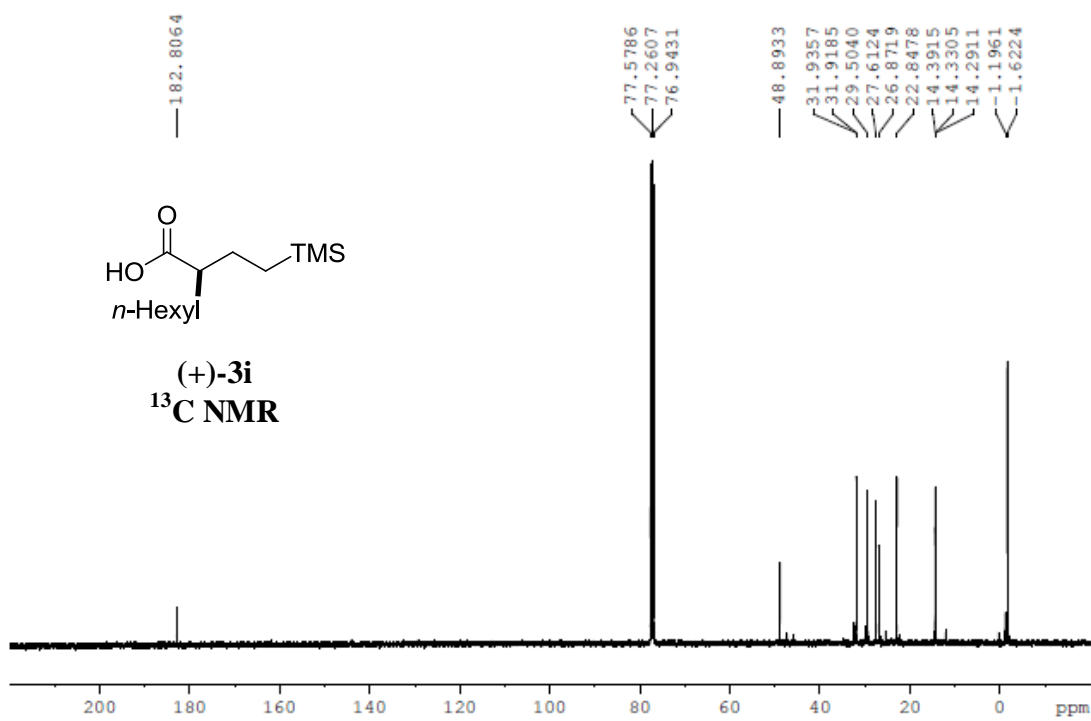
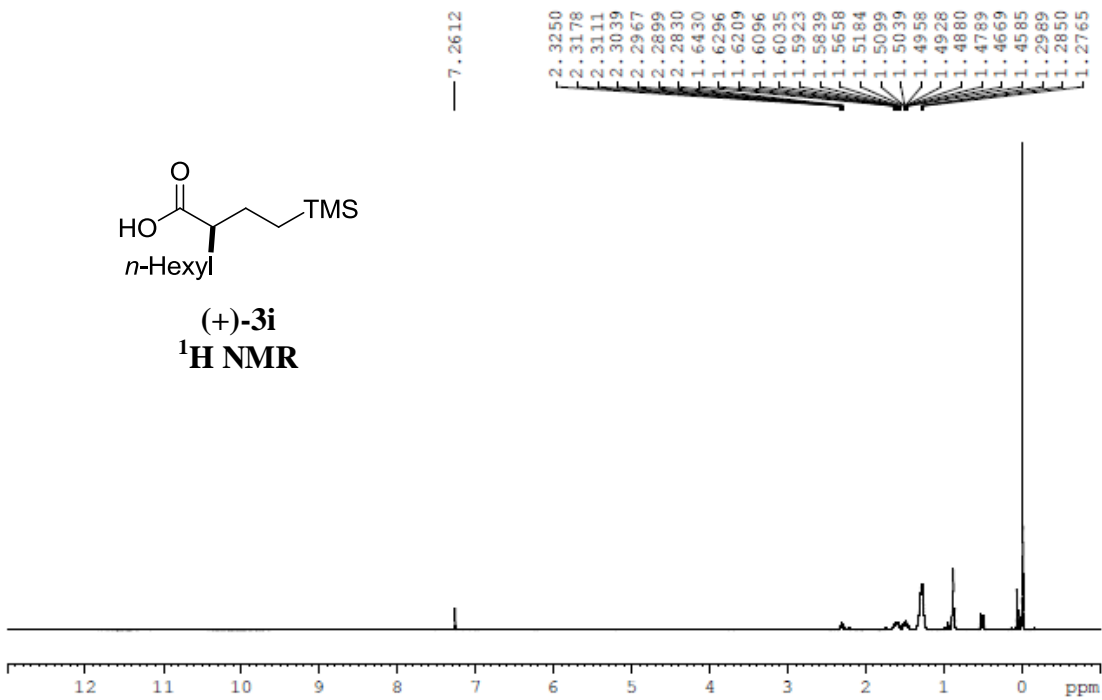


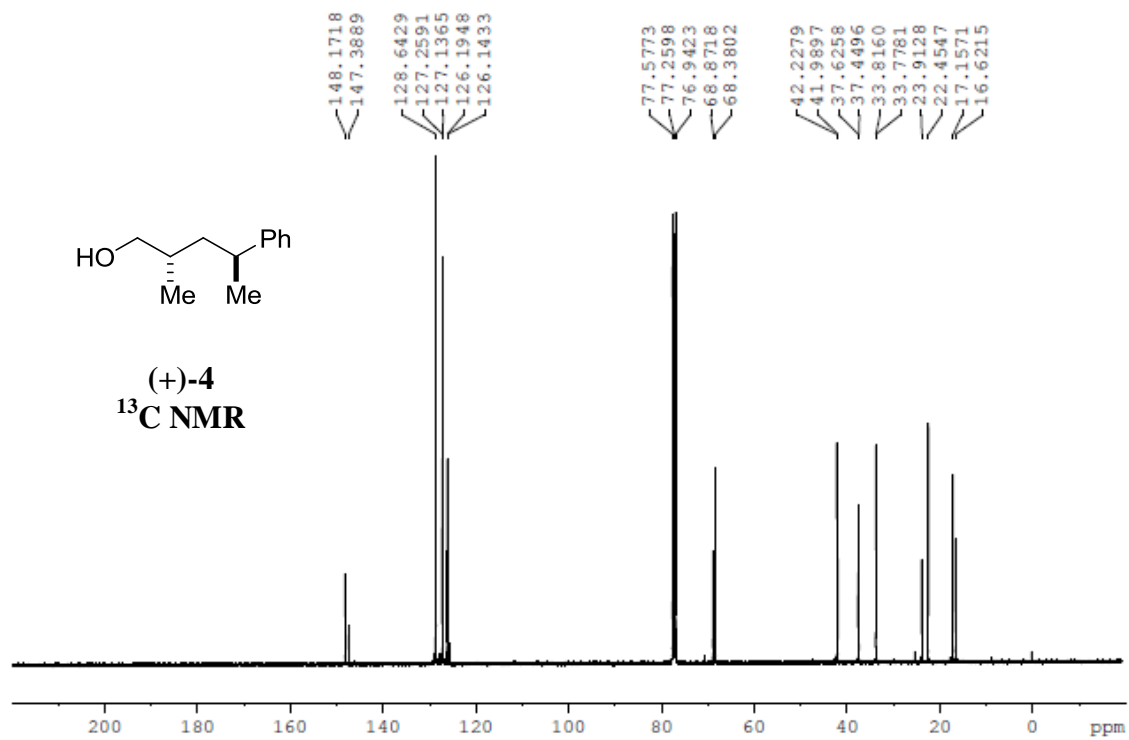
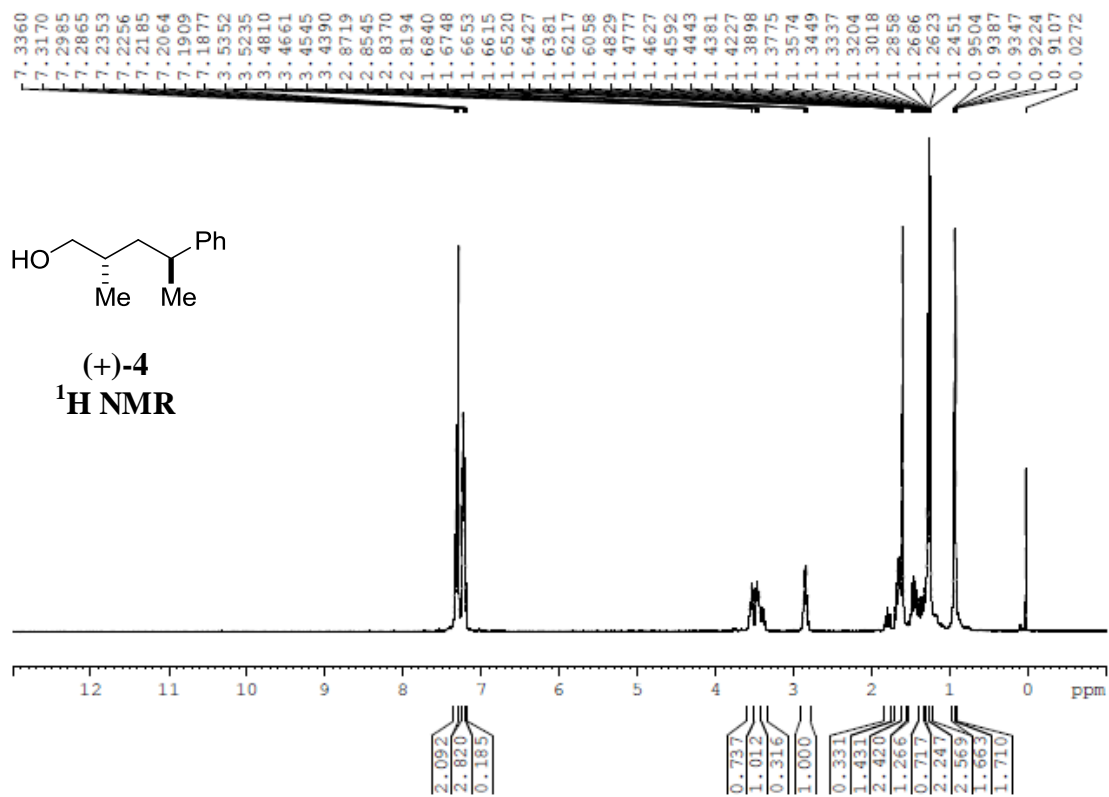


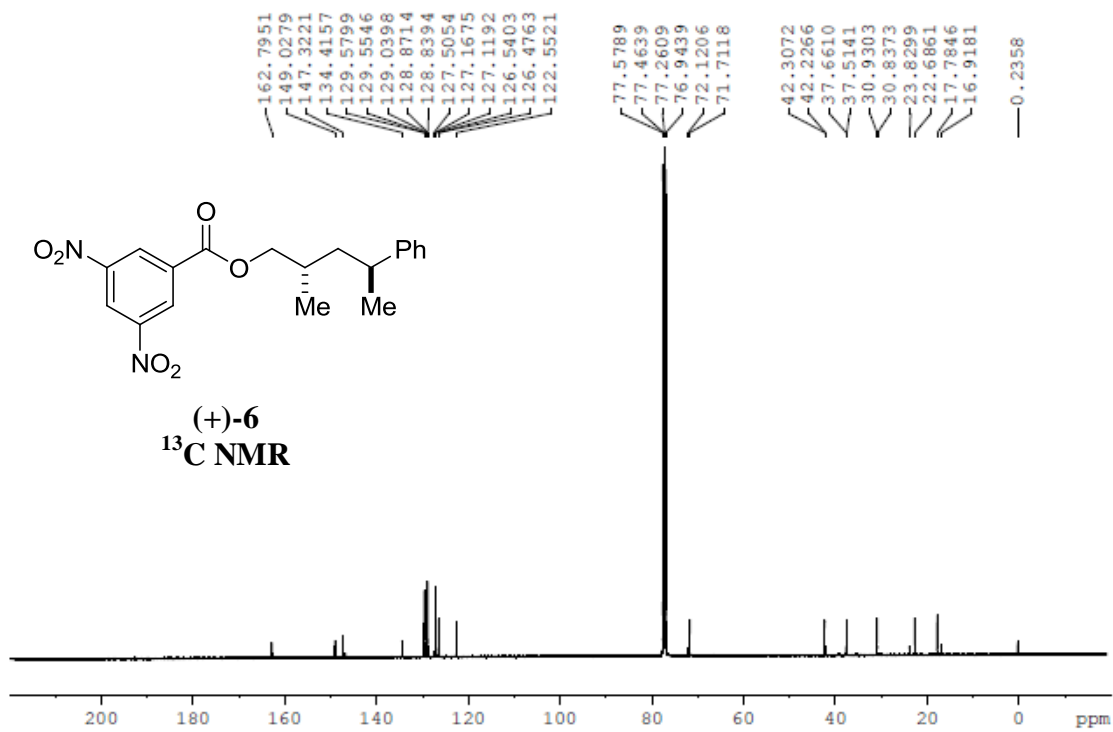
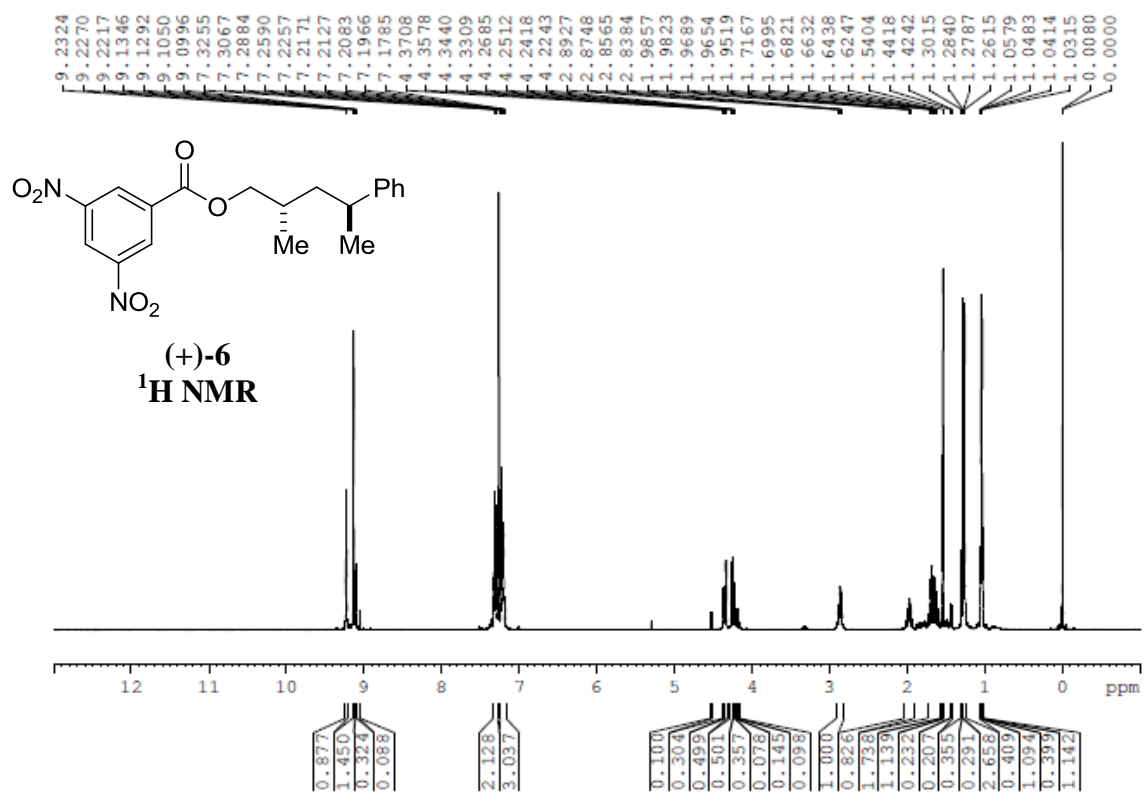


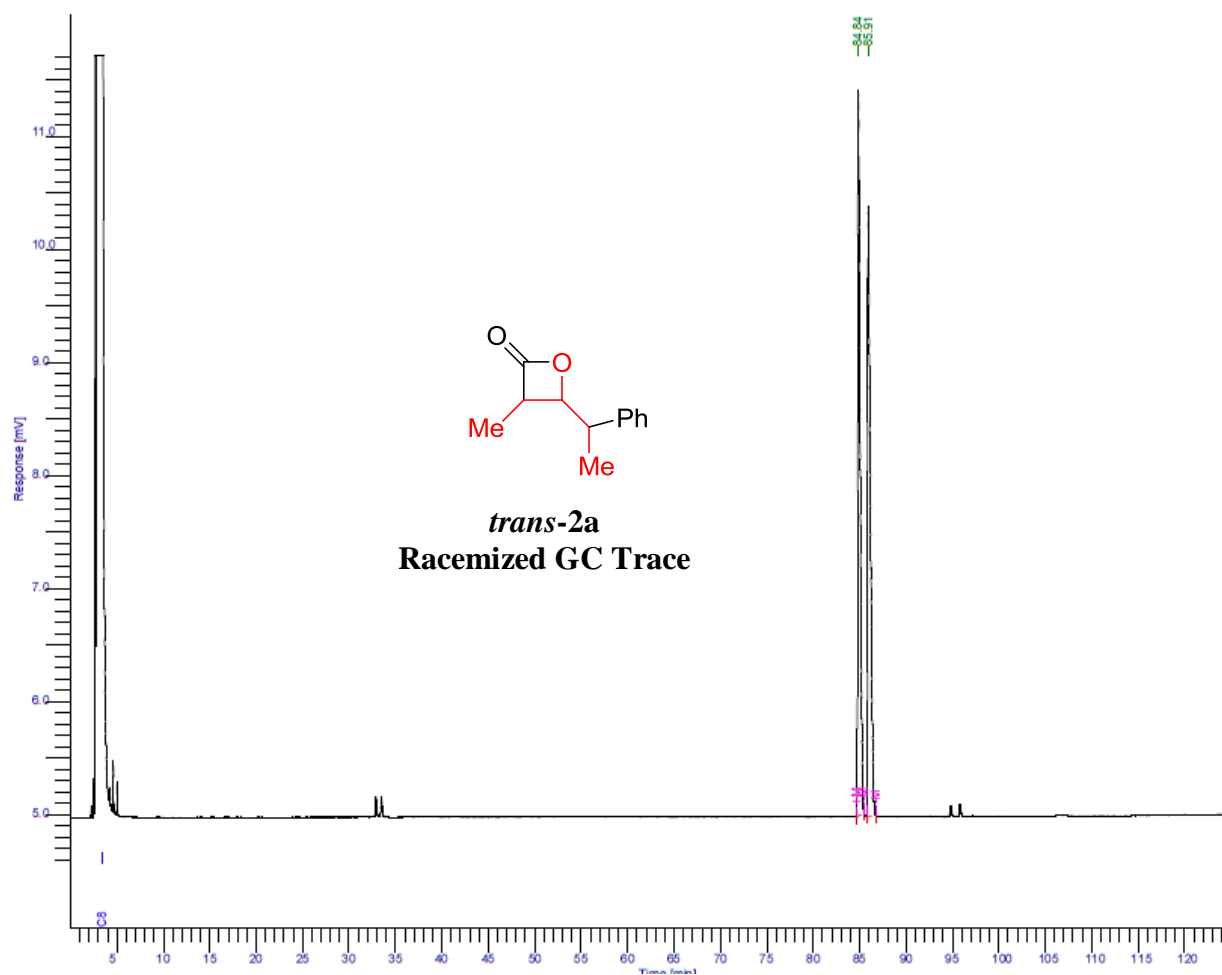




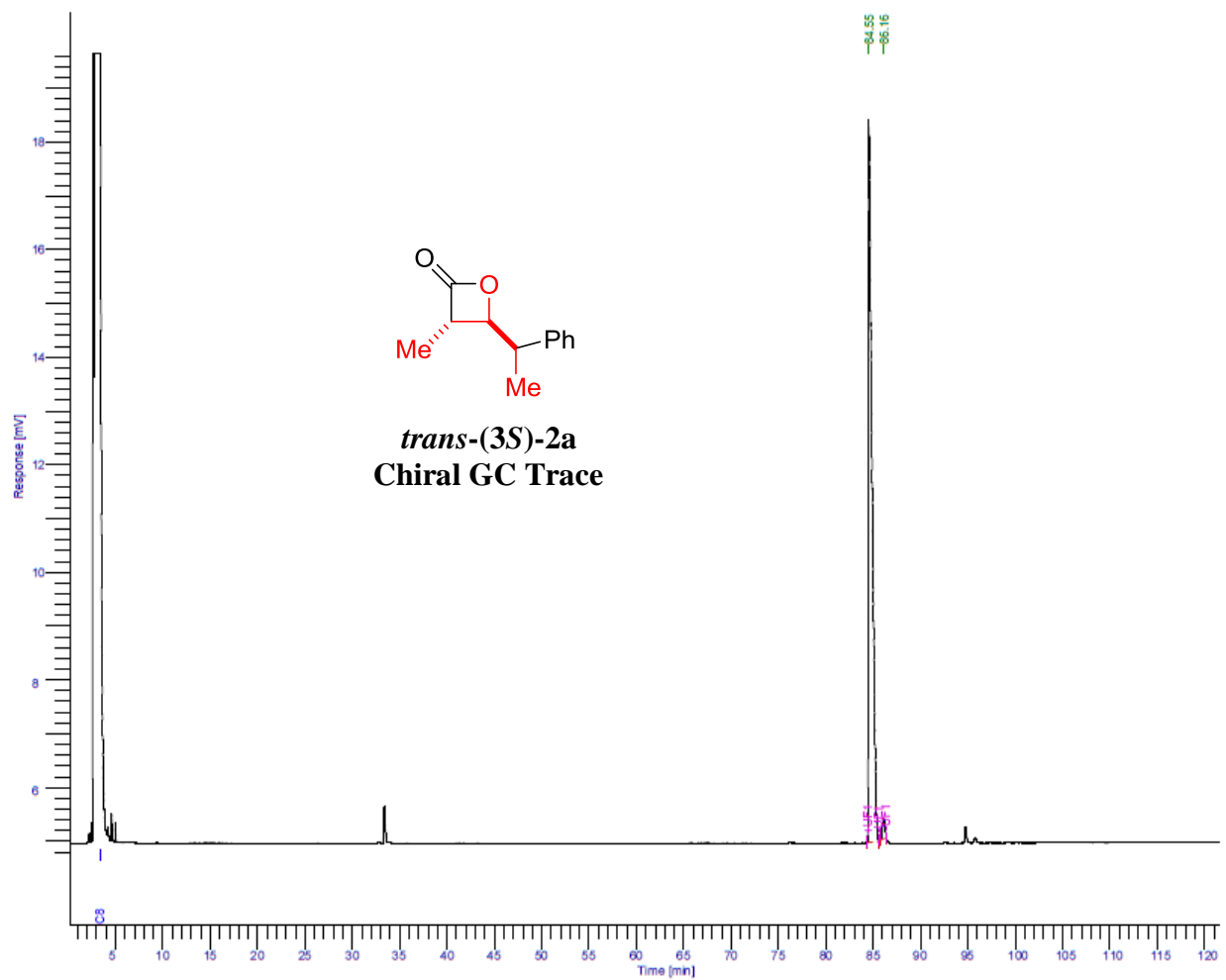




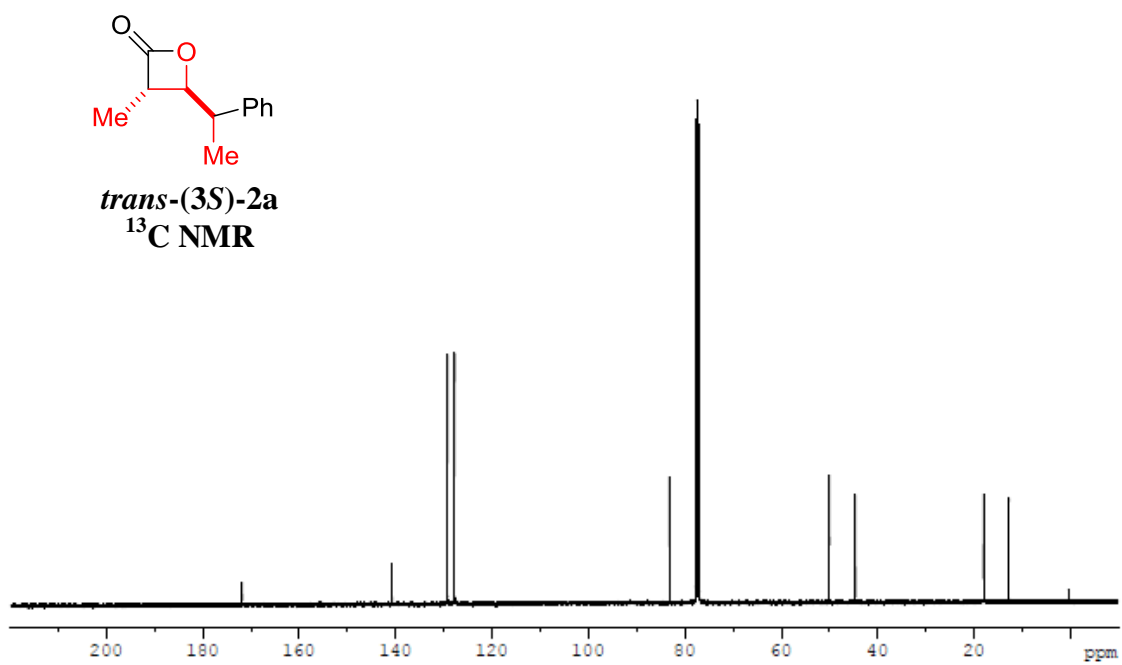
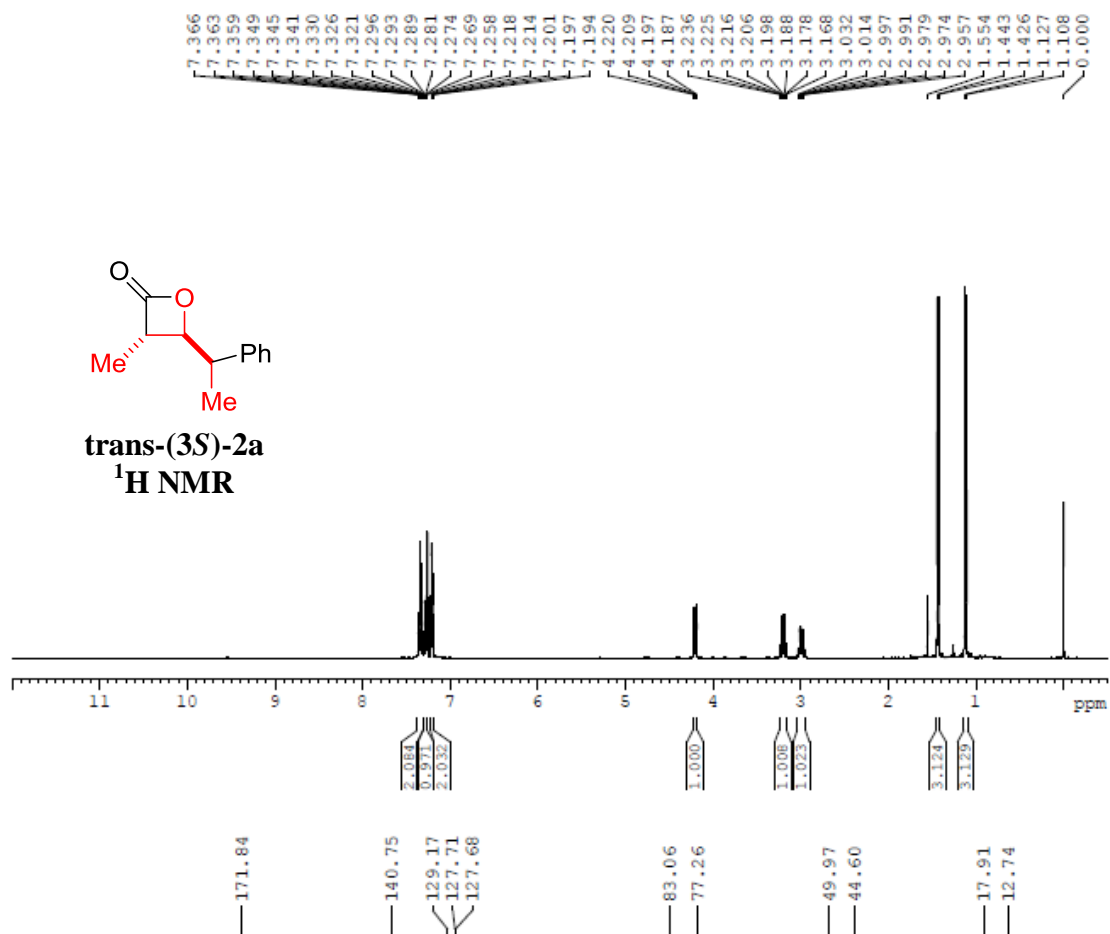


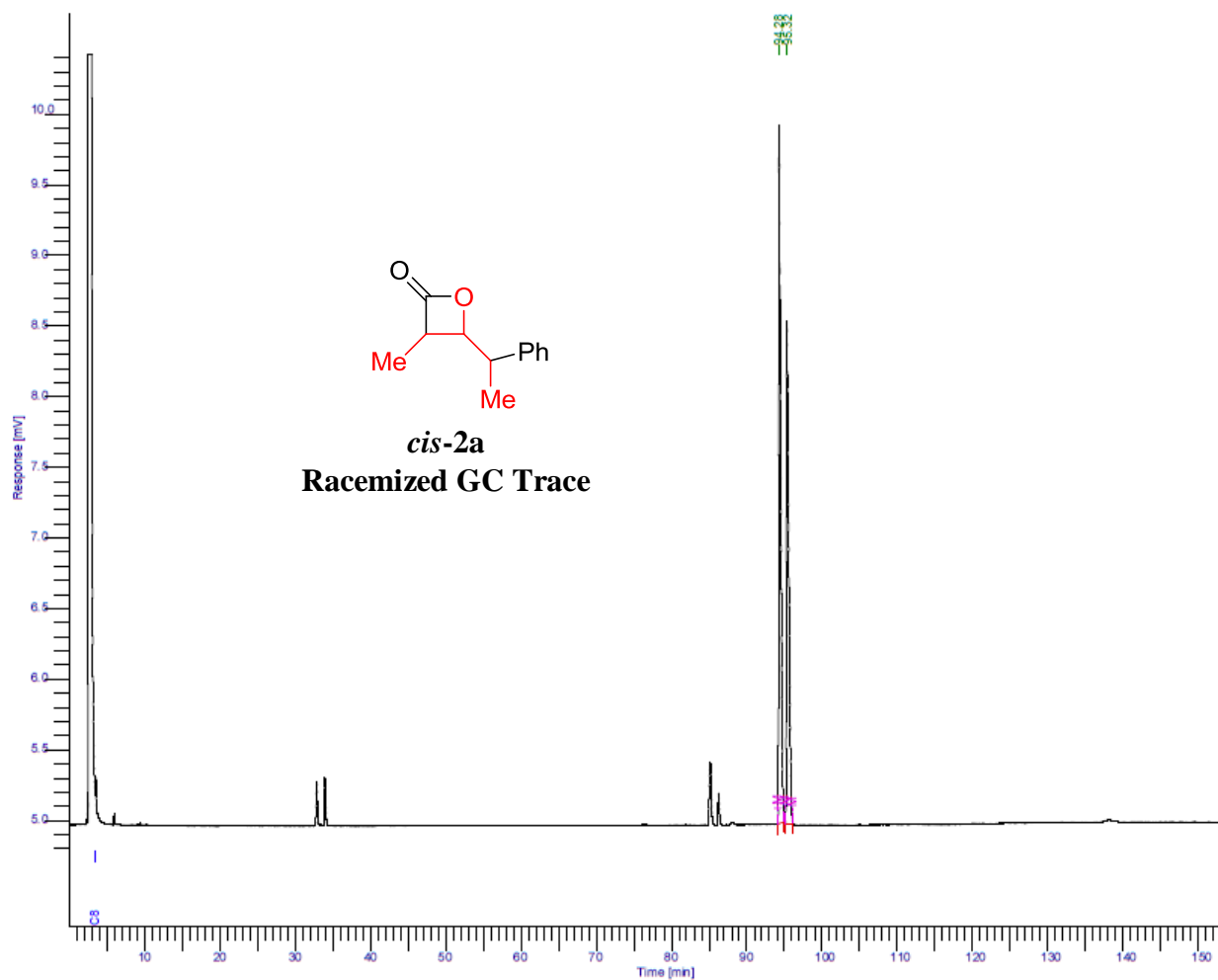


Peak #	Component Name	Time [min]	Area [uV*sec]	Height [uV]	Area/Amount	Raw Amount
1		84.837	109860.03	6393.64	-----	-----
2		85.910	110059.51	5393.53	1.0000e+06	0.1101
			219919.54	11787.17	1.0000e+06	0.1101

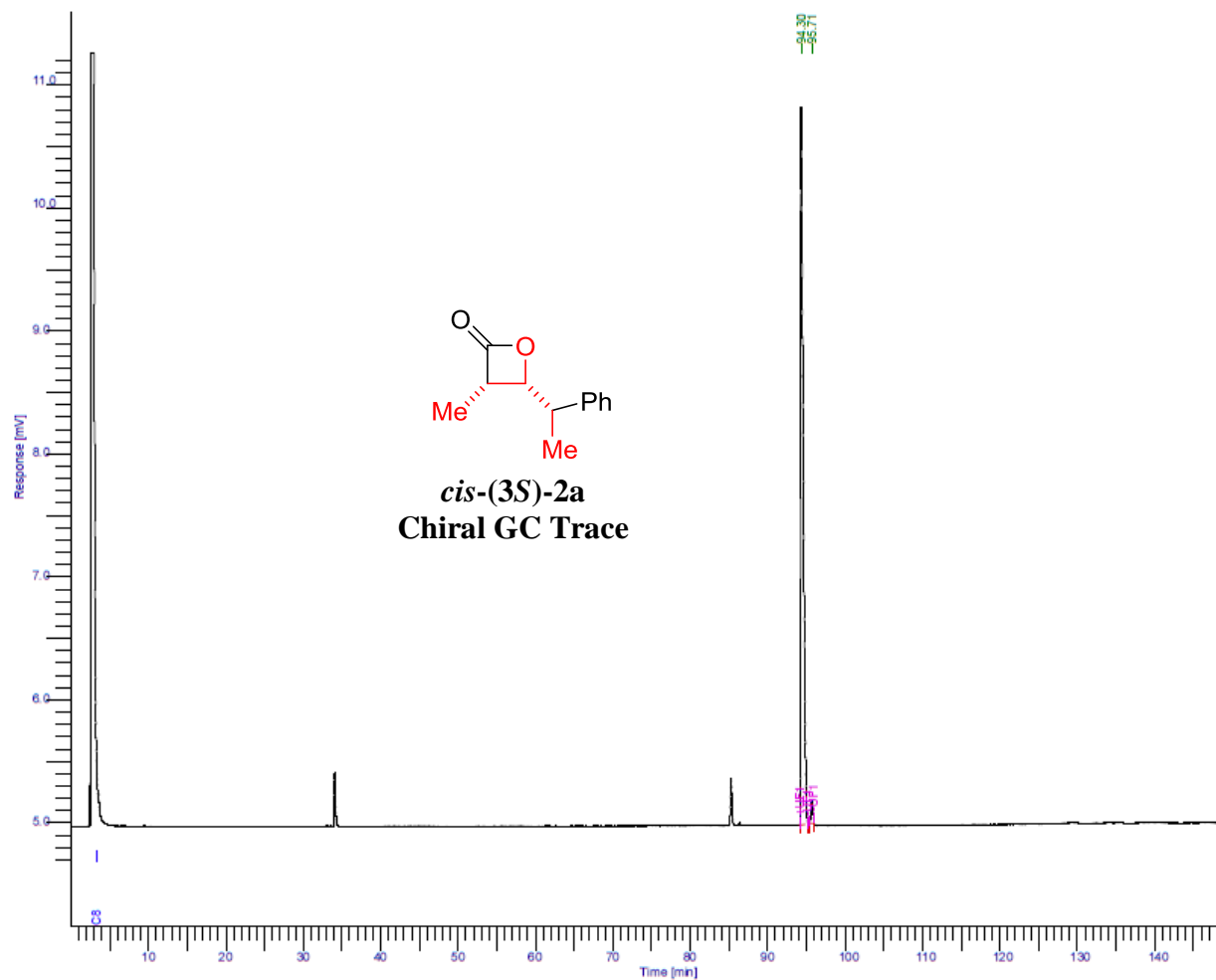


Peak #	Component Name	Time [min]	Area [uV*sec]	Height [uV]	Area/Amount	Raw Amount
1		84.555	351442.55	13276.59	-----	-----
2		86.160	7253.23	378.26	1.0000e+06	0.0073
			358695.78	13654.84	1.0000e+06	0.0073

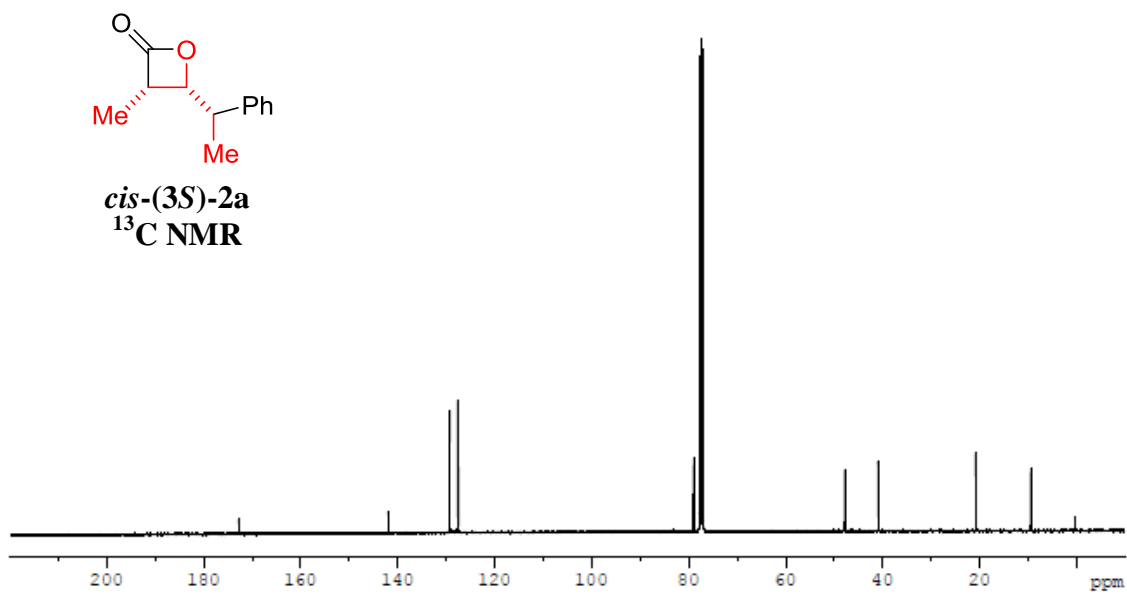
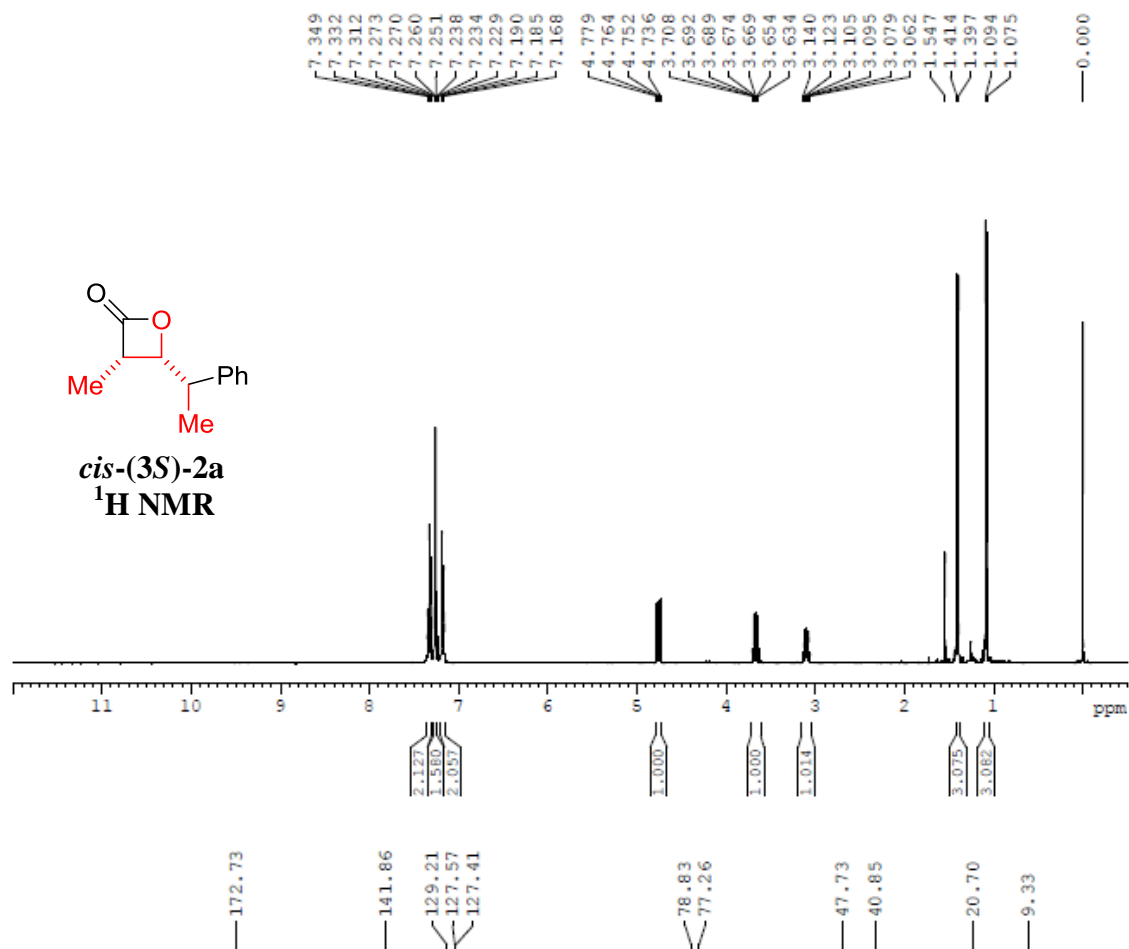


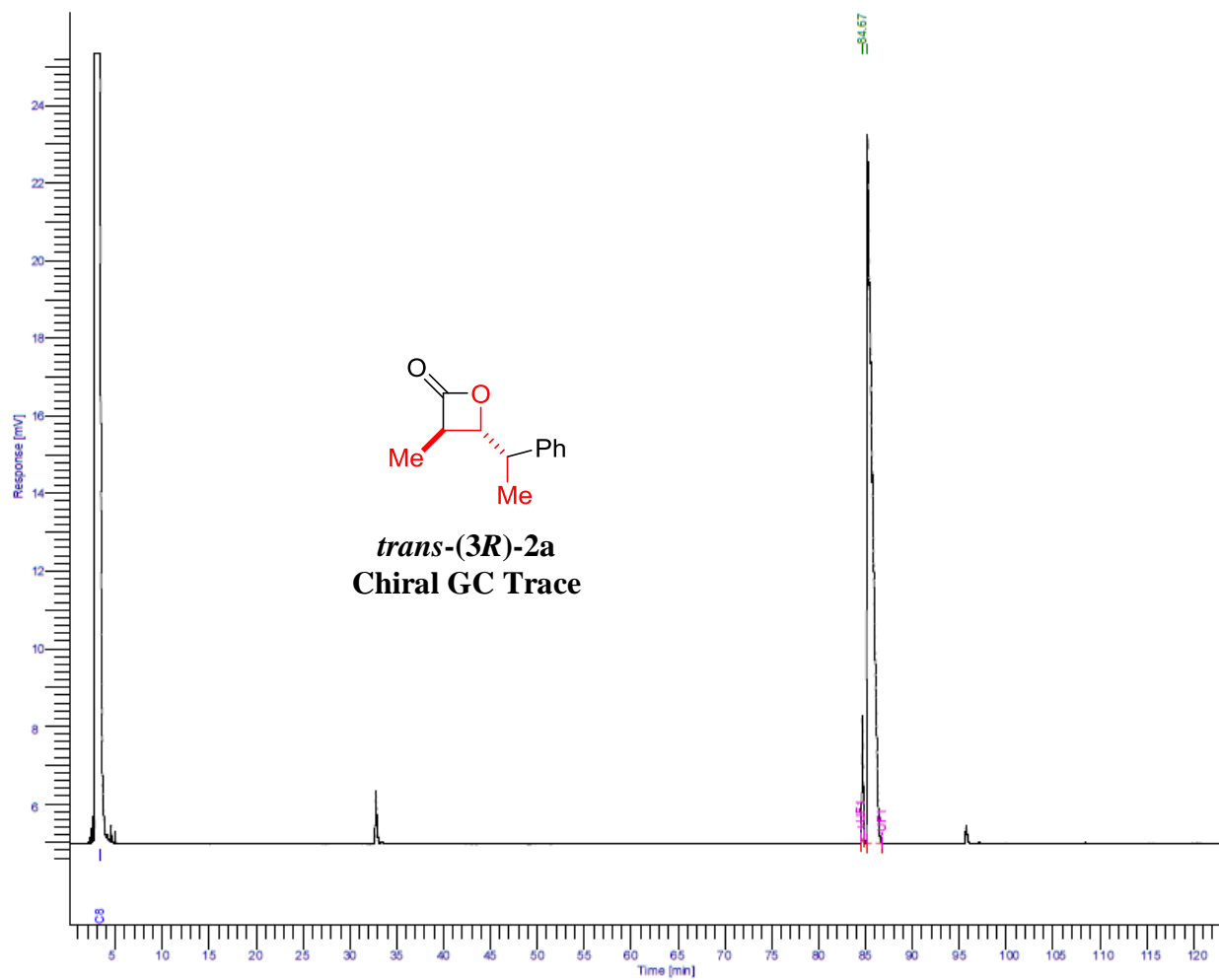


Peak #	Component Name	Time [min]	Area [uV*sec]	Height [uV]	Area/Amount	Raw Amount
1		94.283	86792.47	4949.66	-----	-----
2		95.323	78203.53	3562.43	1.0000e+06	0.0782
			164996.00	8512.09	1.0000e+06	0.0782

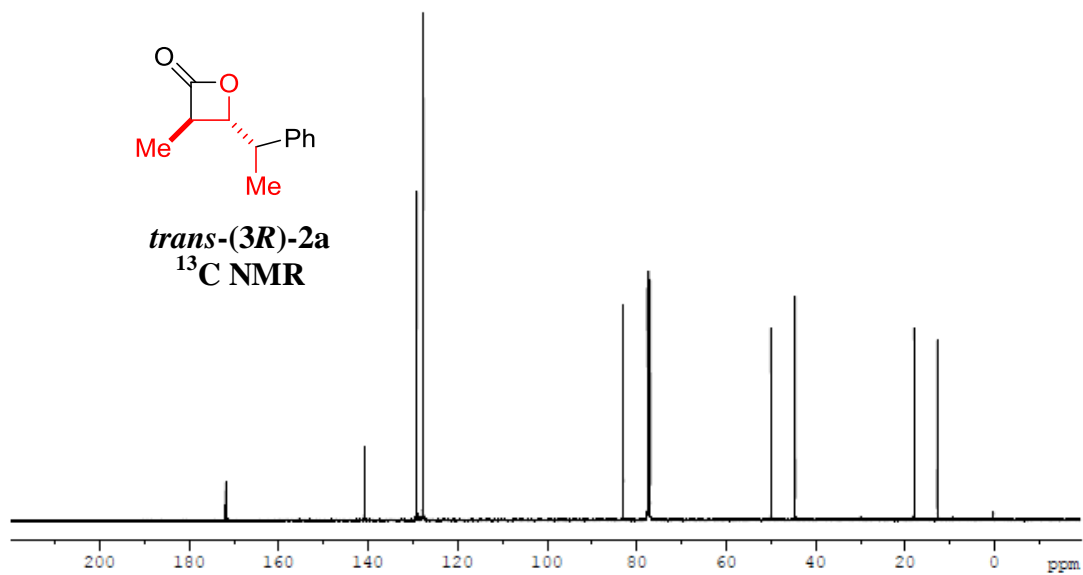
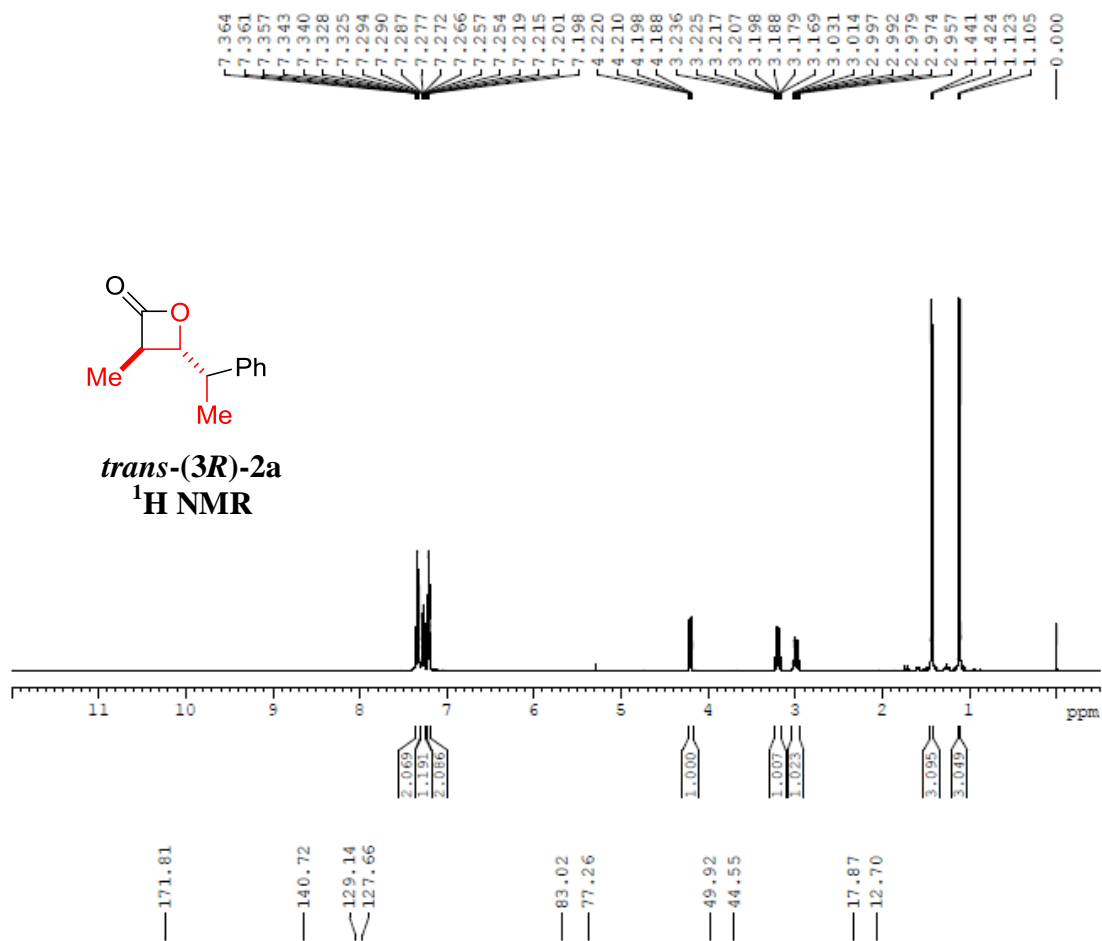


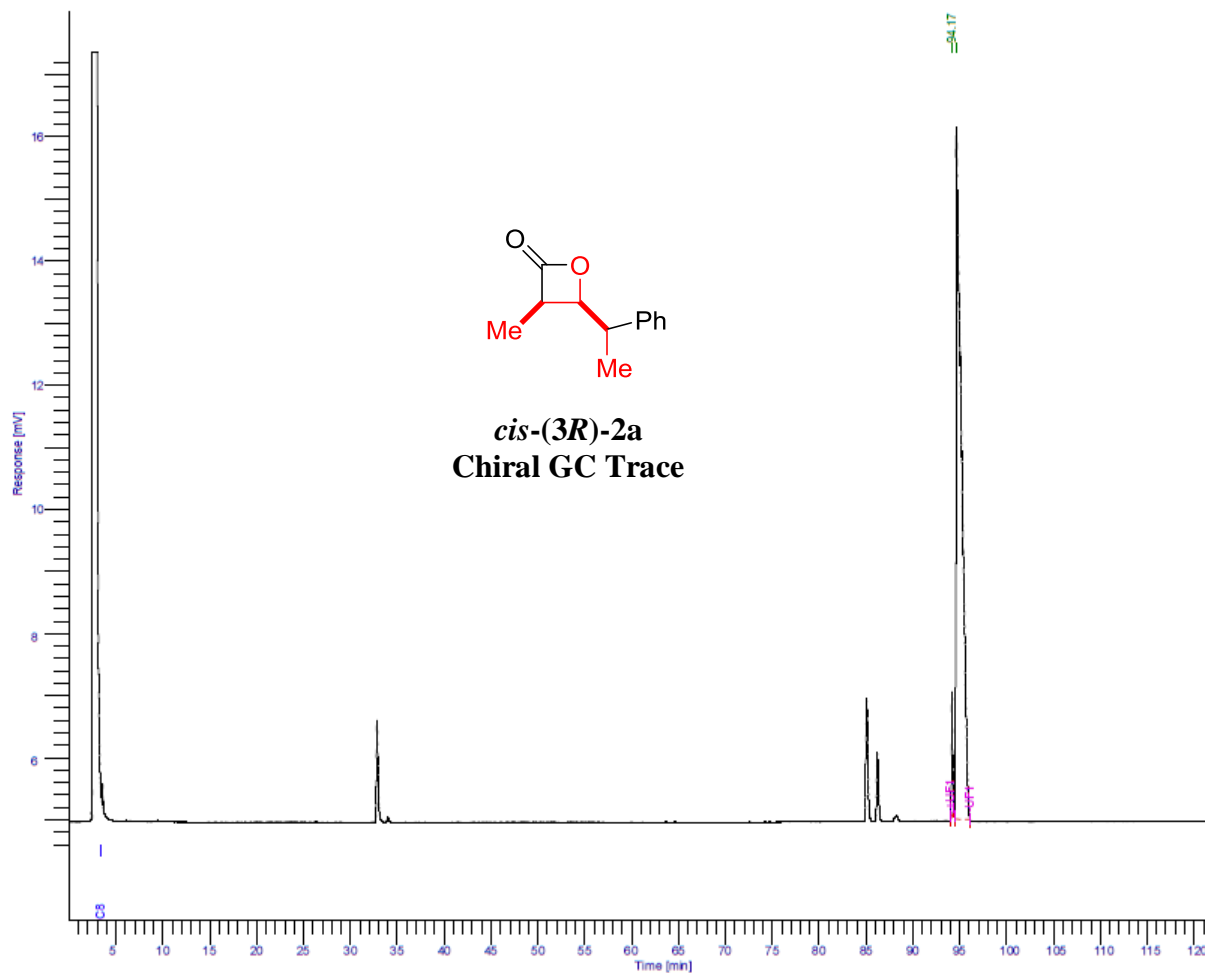
Peak #	Component Name	Time [min]	Area [uV*sec]	Height [uV]	Area/Amount	Raw Amount
1		94.304	125296.48	5833.71	-----	-----
2		95.712	3122.98	179.63	1.0000e+06	0.0031
			128419.46	6013.34	1.0000e+06	0.0031





Peak #	Component Name	Time [min]	Area [uV*sec]	Height [uV]	Area/Amount	Raw Amount
1		84.667	27061.65	3228.42	-----	-----
2		85.200	682702.73	18276.50	1.0000e+06	0.6827
			709764.38	21504.91	1.0000e+06	0.6827





Peak #	Component Name	Time [min]	Area [uV*sec]	Height [uV]	Area/Amount	Raw Amount
1		94.171	17151.21	1996.88	-----	-----
2		94.629	440676.68	11138.28	1.0000e+06	0.4407
			457827.89	13135.17	1.0000e+06	0.4407

