

Supporting Information

Highly active ruthenium catalyst supported on magnetically separable mesoporous organosilica nanoparticles

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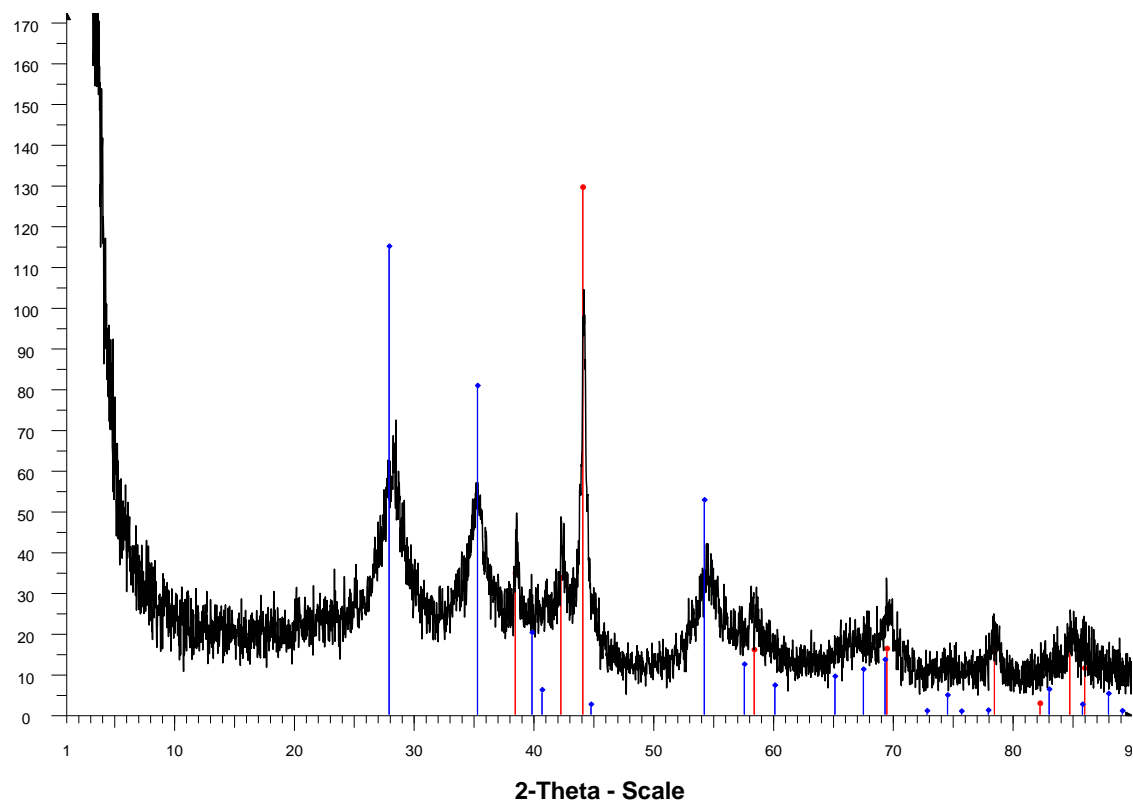
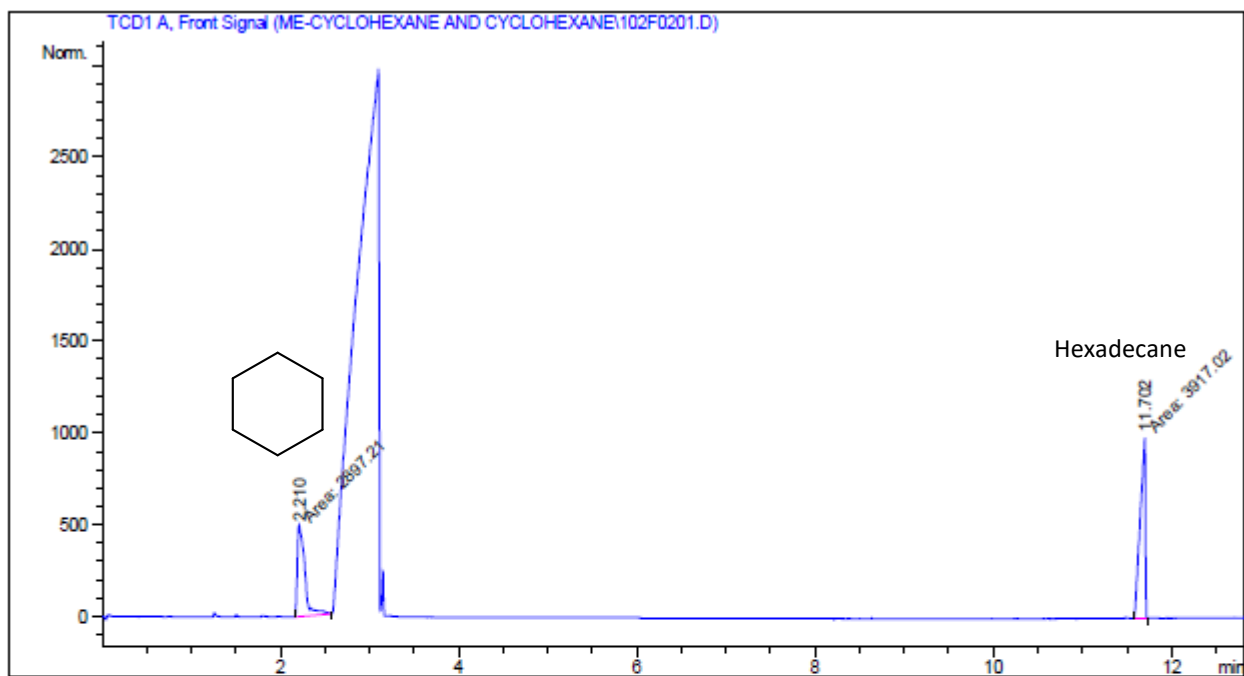


Figure S1. XRD pattern of Ru@Ethylene PMO NPs.

GC analysis for the products obtained by hydrogenation of benzene



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Area Percent Report
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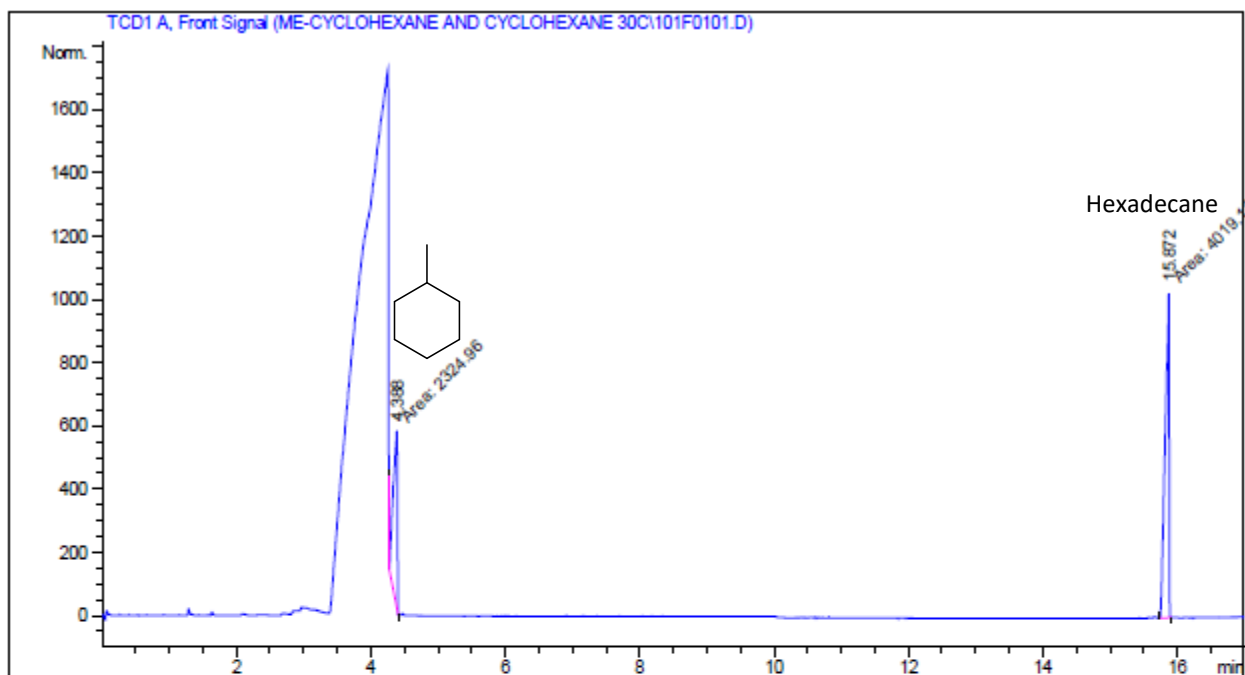
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Dilution: : 1.0000
Use Multiplier & Dilution Factor with ISTDs

Signal 1: TCD1 A, Front Signal

Peak #	RetTime [min]	Type	Width [min]	Area [25 µV*s]	Height [25 µV]	Area %
1	2.210	MM	0.0972	2897.20874	496.63031	42.51702
2	11.702	MM	0.0656	3917.02417	995.61847	57.48298

Totals : 6814.23291 1492.24878

GC analysis for the products obtained by hydrogenation of toluene



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Area Percent Report
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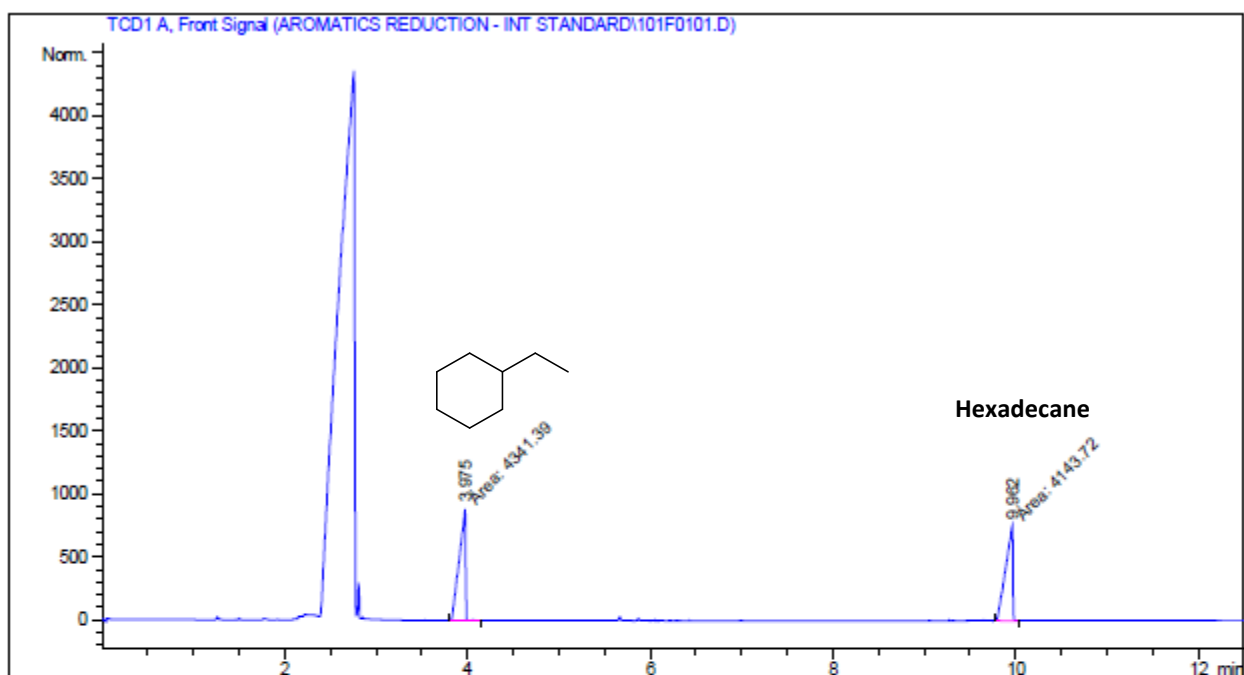
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Use Multiplier & Dilution Factor with ISTDs

Signal 1: TCD1 A, Front Signal

Peak #	RetTime [min]	Type	Width [min]	Area [25 µV*s]	Height [25 µV]	Area %
1	4.388	MM	0.0673	2324.95557	575.88855	36.64765
2	15.872	MM	0.0638	4019.12329	1049.16675	63.35235

Totals : 6344.07886 1625.05530

GC analysis for the products obtained by hydrogenation of ethylbenzene



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Area Percent Report
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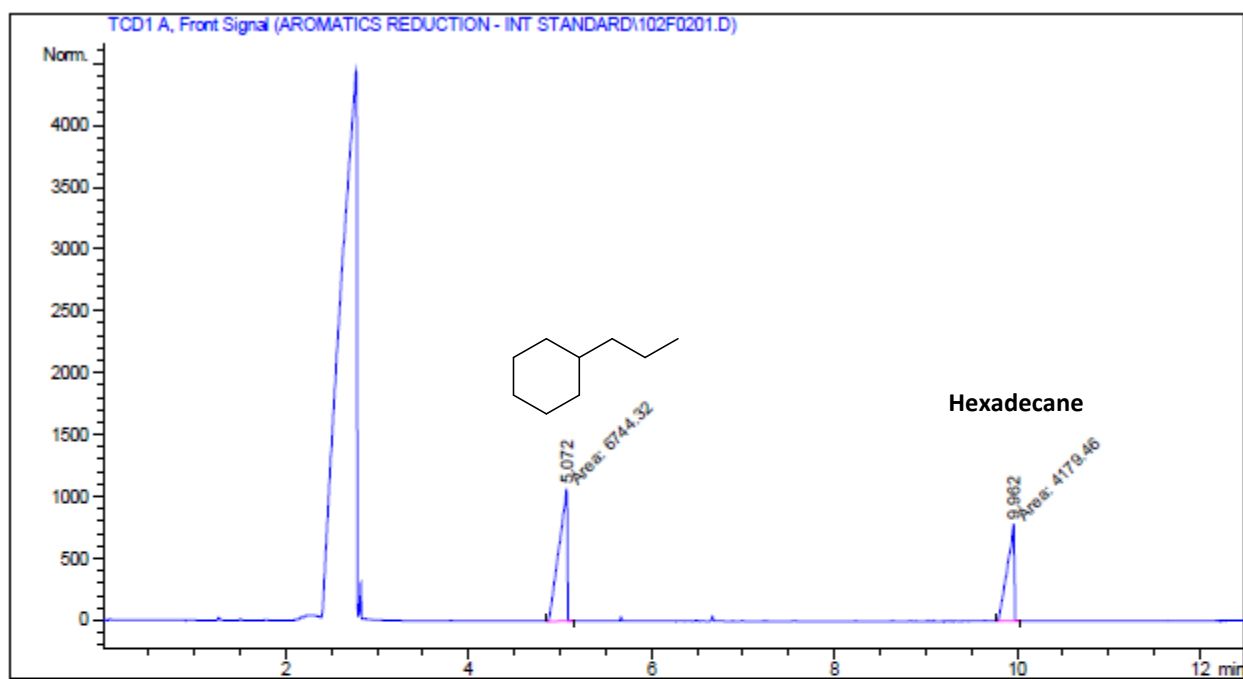
Sorted By : Signal
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Dilution: : 1.0000
Use Multiplier & Dilution Factor with ISTDs

Signal 1: TCD1 A, Front Signal

Peak #	RetTime [min]	Type	Width [min]	Area [25 µV*s]	Height [25 µV]	Area %
1	3.975	MM	0.0801	4341.39307	903.26495	51.16482
2	9.962	MM	0.0900	4143.72021	767.62976	48.83518

Totals : 8485.11328 1670.89471

GC analysis for the products obtained by hydrogenation of propylbenzene



Area Percent Report

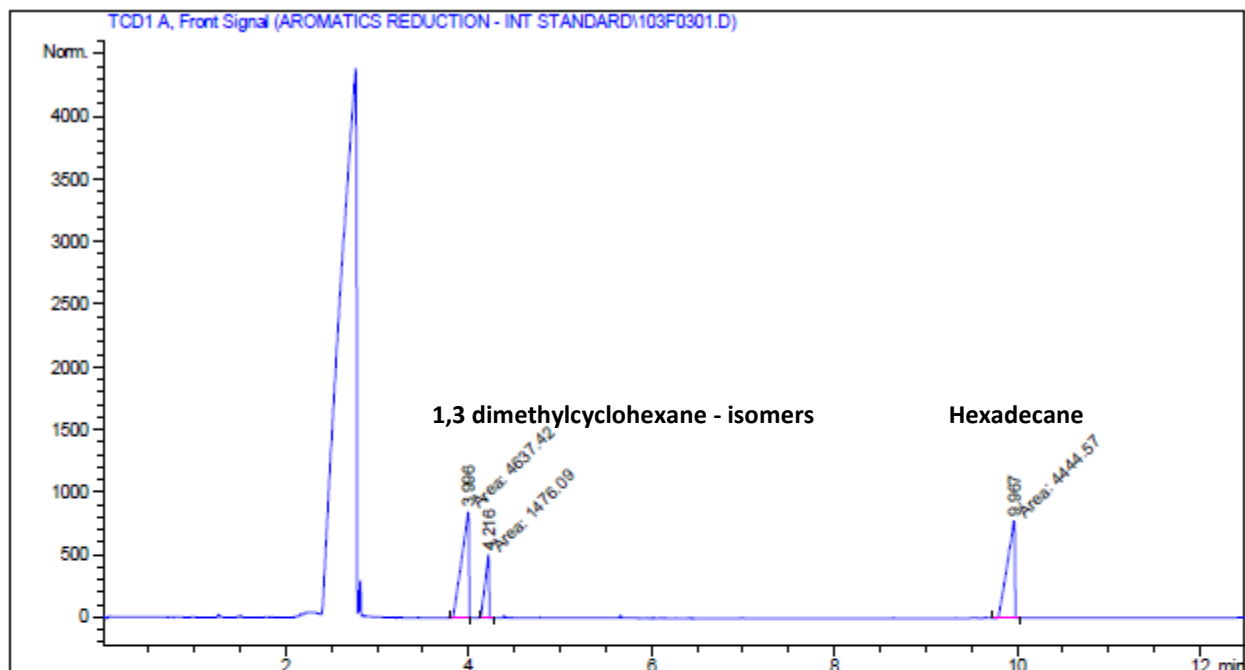
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Dilution: : 1.0000
Use Multiplier & Dilution Factor with ISTDs

Signal 1: TCD1 A, Front Signal

Peak #	RetTime [min]	Type	Width [min]	Area [25 µV*s]	Height [25 µV]	Area %
1	5.072	MM	0.1042	6744.32324	1078.44275	61.73979
2	9.962	MM	0.0882	4179.46436	789.55872	38.26021

Totals : 1.09238e4 1868.00146

GC analysis for the products obtained by hydrogenation of *m*-xylene



Area Percent Report

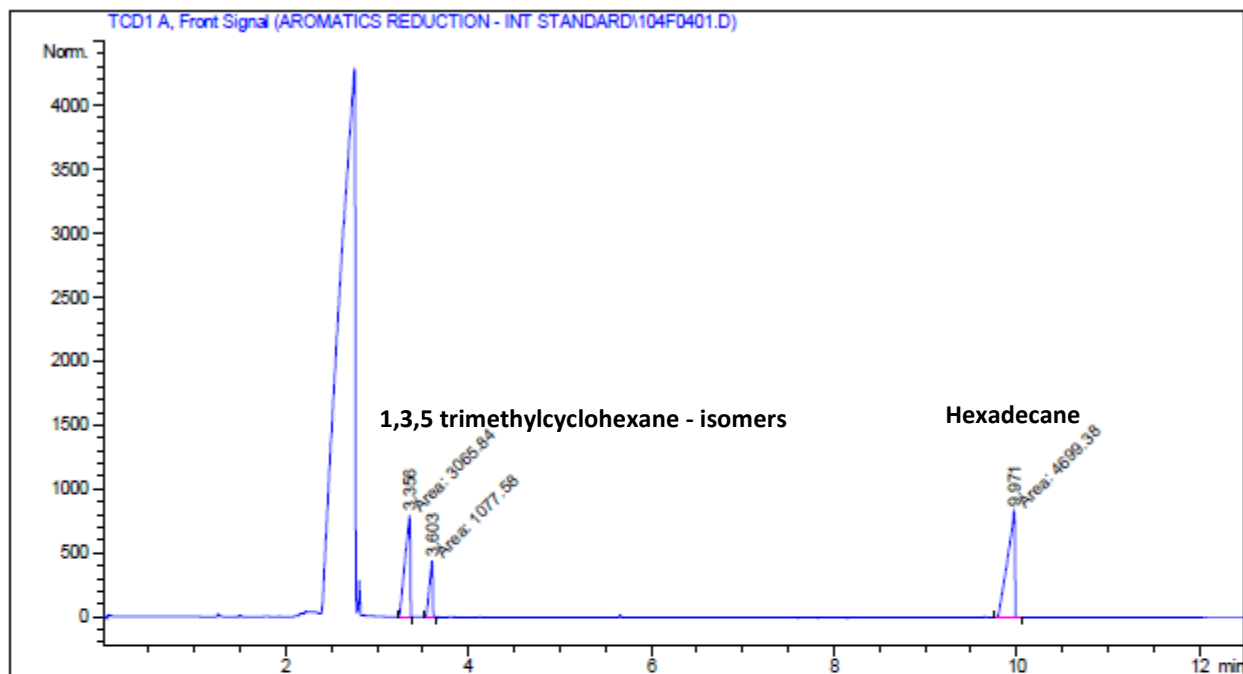
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Use Multiplier & Dilution Factor with ISTDs

Signal 1: TCD1 A, Front Signal

Peak #	RetTime [min]	Type	Width [min]	Area [25 µV*s]	Height [25 µV]	Area %
1	3.996	MM	0.0912	4637.41895	847.20819	43.92292
2	4.216	MM	0.0494	1476.09338	497.98663	13.98069
3	9.967	MM	0.0956	4444.57227	775.12061	42.09639

Totals : 1.05581e4 2120.31543

GC analysis for the products obtained by hydrogenation of mesitylene



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Area Percent Report
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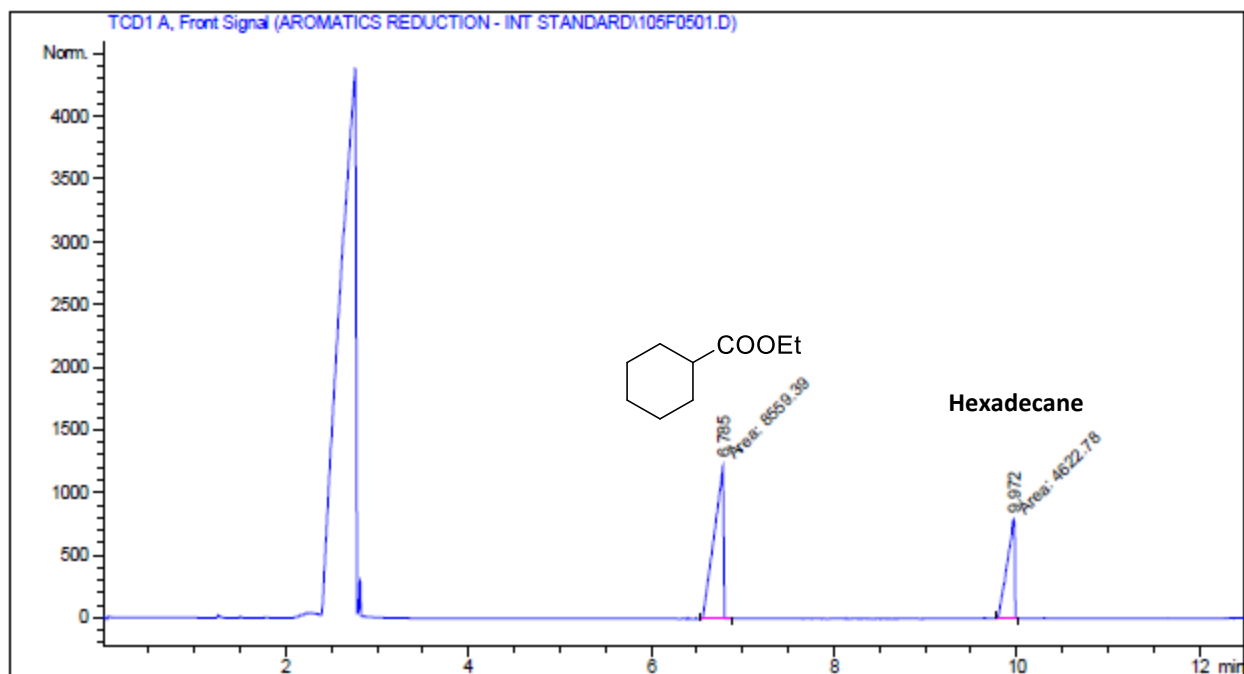
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Use Multiplier & Dilution Factor with ISTDs

Signal 1: TCD1 A, Front Signal

Peak #	RetTime [min]	Type	Width [min]	Area [25 µV*s]	Height [25 µV]	Area %
1	3.356	MM	0.0638	3065.84180	800.90167	34.67047
2	3.603	MM	0.0405	1077.57886	442.99286	12.18594
3	9.971	MM	0.0941	4699.38428	832.36743	53.14359

Totals : 8842.80493 2076.26196

GC analysis for the products obtained by hydrogenation of ethyl benzoate



Area Percent Report

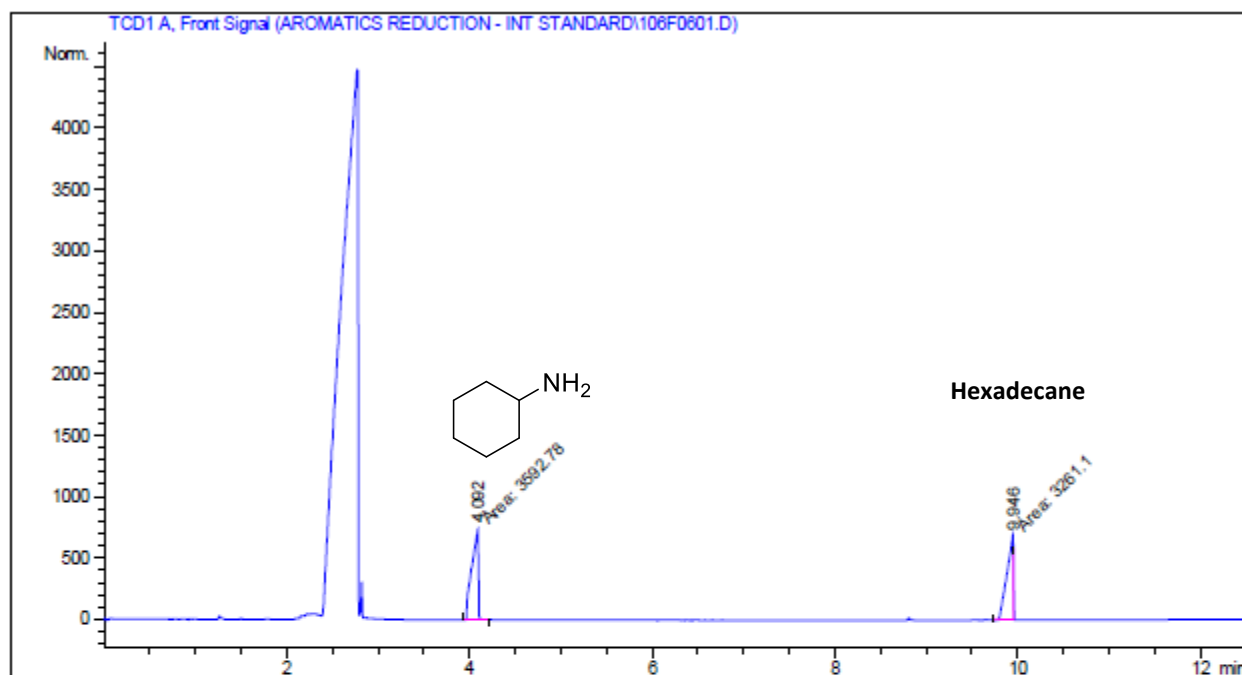
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Dilution: : 1.0000
Use Multiplier & Dilution Factor with ISTDs

Signal 1: TCD1 A, Front Signal

Peak #	RetTime [min]	Type	Width [min]	Area [25 µV*s]	Height [25 µV]	Area %
1	6.785	MM	0.1144	8559.38770	1247.05359	64.93154
2	9.972	MM	0.0952	4622.78467	809.40308	35.06846

Totals : 1.31822e4 2056.45667

GC analysis for the products obtained by hydrogenation of nitrobenzene



Area Percent Report

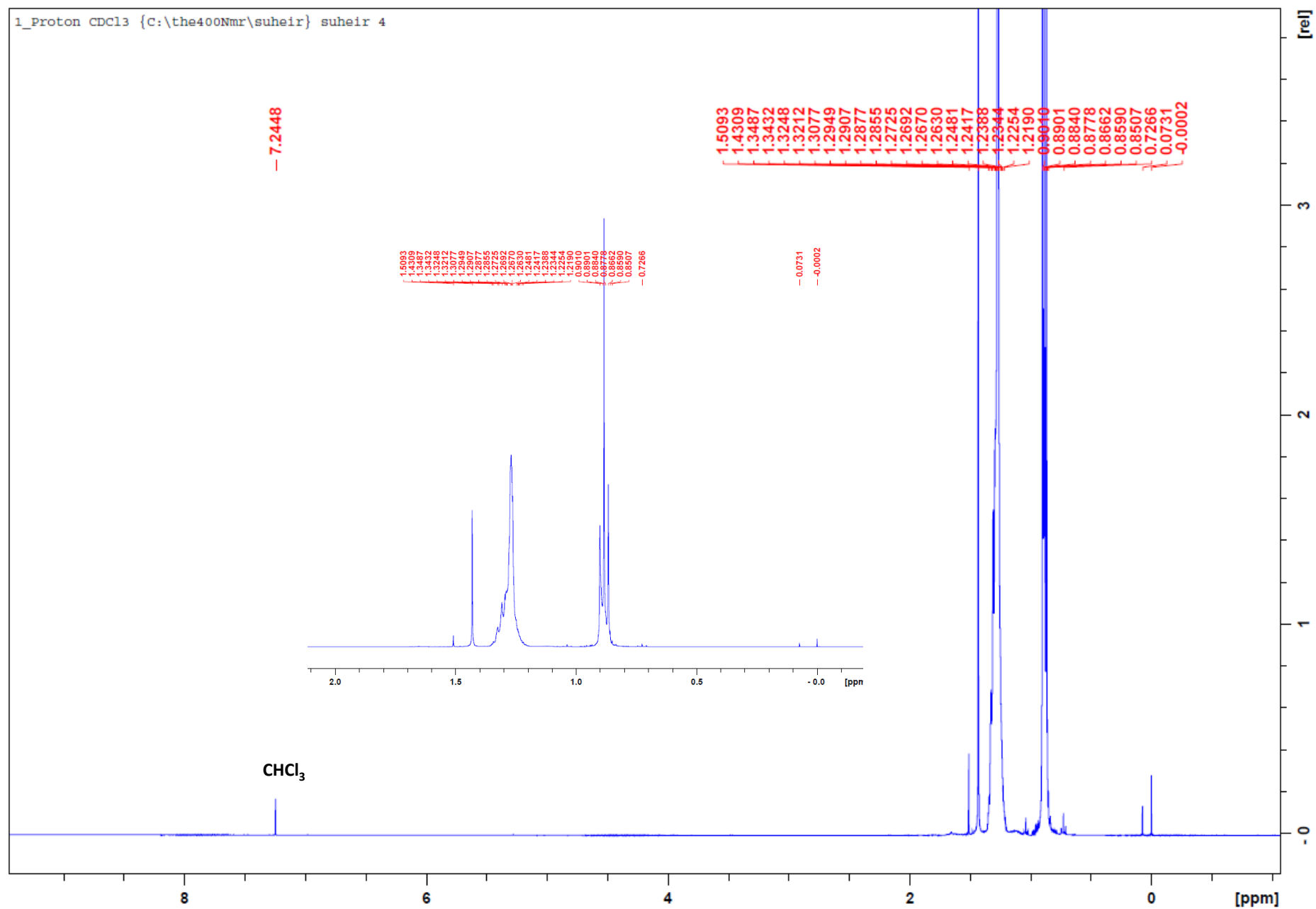
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Use Multiplier & Dilution Factor with ISTDs

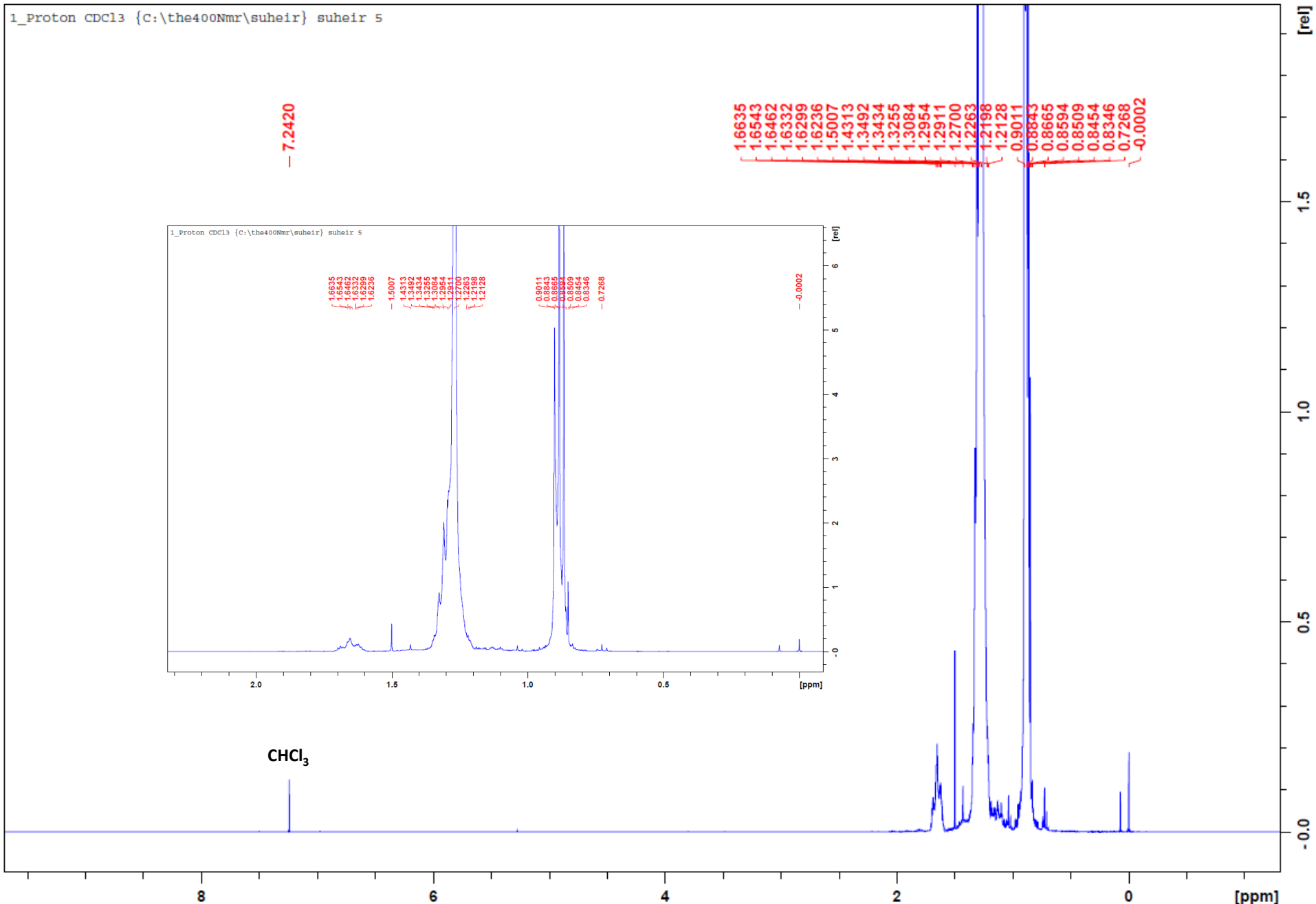
Signal 1: TCD1 A, Front Signal

Peak #	RetTime [min]	Type	Width [min]	Area [25 µV*s]	Height [25 µV]	Area %
1	4.092	MM	0.0805	3592.77637	744.04248	52.41964
2	9.946	MM	0.0781	3261.09814	695.64331	47.58036

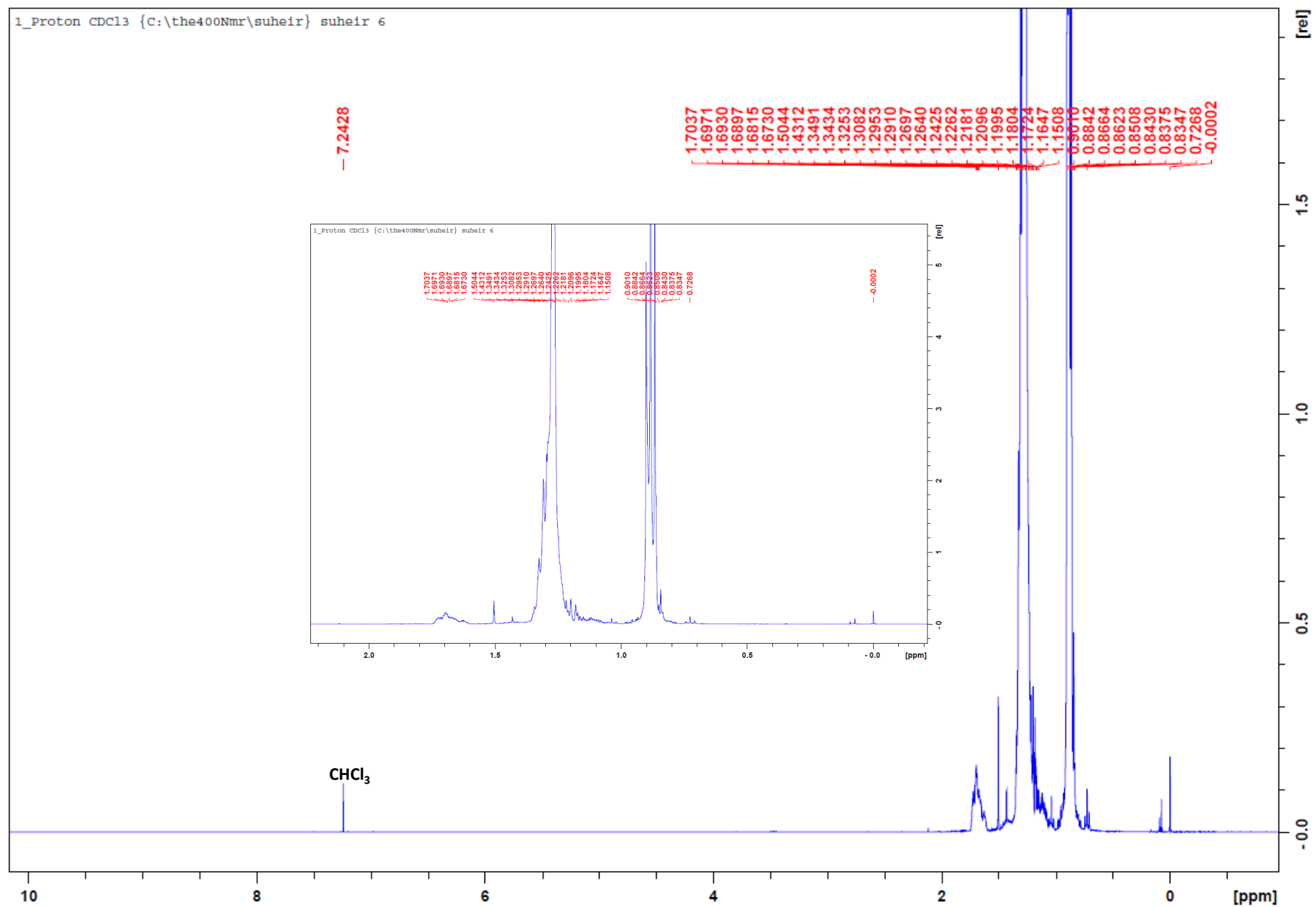
Totals : 6853.87451 1439.68579

¹H NMR spectrum of the products obtained by hydrogenation of benzene

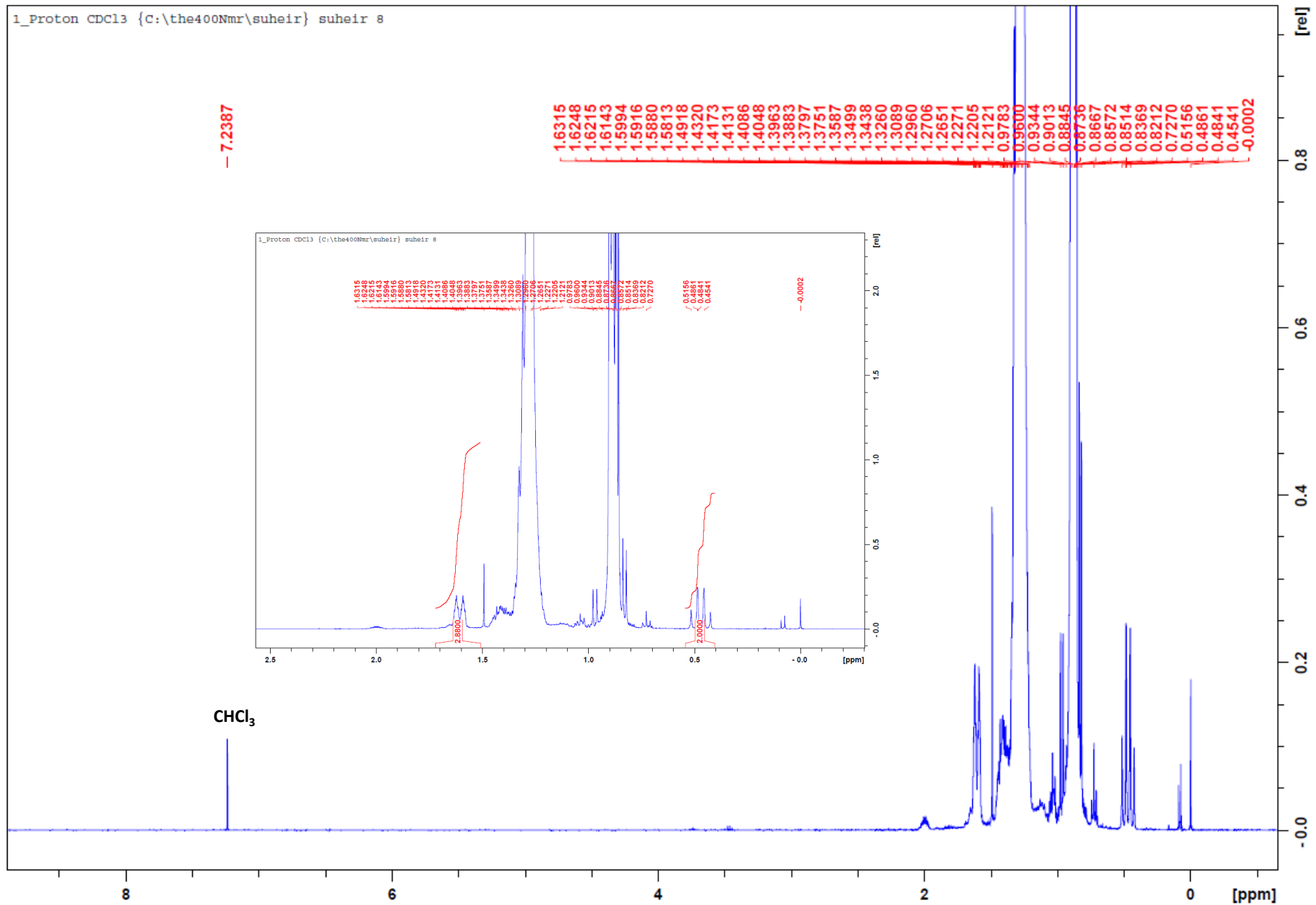


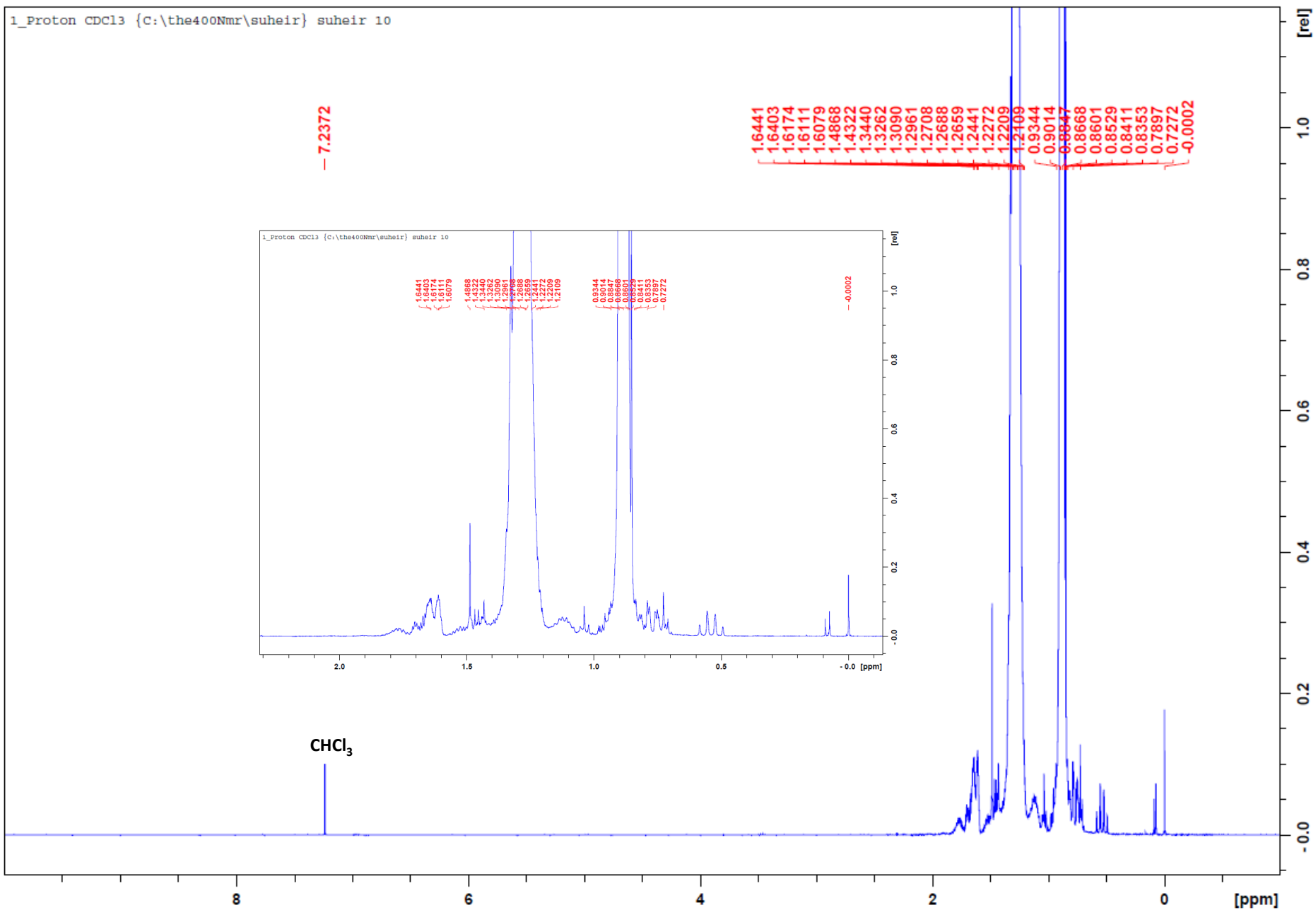
¹H NMR spectrum of the products obtained by hydrogenation of toluene

¹HNMR spectrum of the products obtained by hydrogenation of ethylbenzene

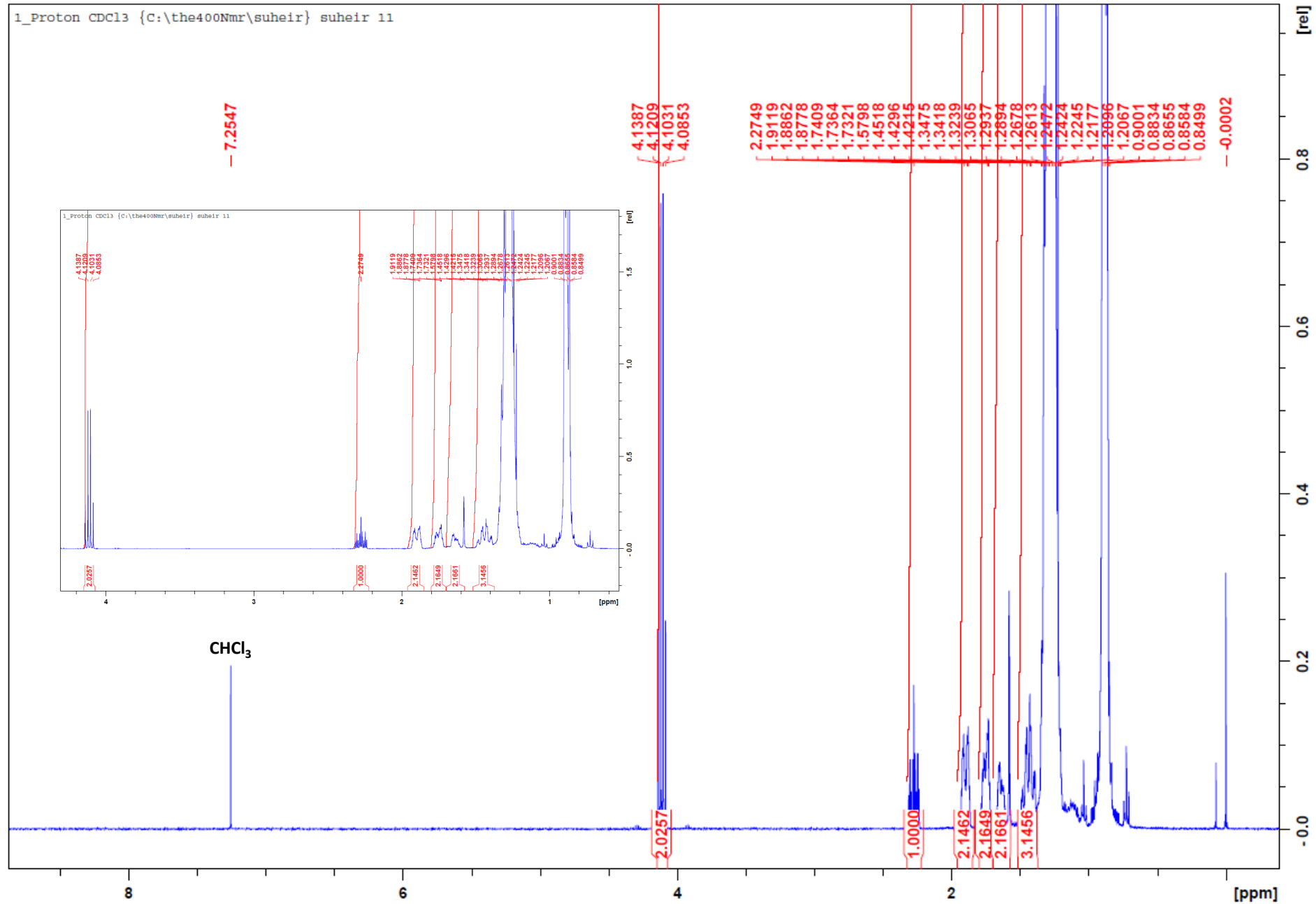


¹HNMR spectrum of the products obtained by hydrogenation of *m*-xylene



¹HNMR spectrum of the products obtained by hydrogenation of mesitylene

¹HNMR spectrum of the products obtained by hydrogenation of ethyl benzoate



¹HNMR spectrum of the products obtained by hydrogenation of nitrobenzene

