

**Table S1** Aqueous phase hydrogenation of the light oxygenate fraction of bio oil over 5 wt% Ru/C catalyst. Reaction conditions: Pressure 5.18 MPa, Temperature 120 °C, WHSV 1.5 h<sup>-1</sup>, and H<sub>2</sub> flow rate 40 mL min<sup>-1</sup>.

Species (mmol L <sup>-1</sup> )	Feed	6h products	24h products
Acetic acid	1936.6	1323.7	1873.2
Hydroxymethylfurfural	0.9	0	3.2
Furfural	61.6	0	0.9
Formic acid	230.8	8.4	38.8
Acetaldehyde	28.7	0	5.3
Methanol	423.8	657.1	607.0
Ethanol	4.1	167.3	33.6
Hydroxyacetaldehyde	610.7	10.0	23.1
Hydroxyacetone	477.5	8.5	623.7
Propionic acid	104.9	51.0	140.4
Butyric acid	211.2	15.7	40.4
1,2-propanediol	0	351.3	25.0
Ethylene glycol	0	382.4	145.3
2-propanol	0	13.9	2.9
1-butanol	0	12.7	1.5
1,4-butanediol	0	150.9	72.3
1,3-butanediol	20.2	11.8	10.2
2,3-butanediol	0	71.0	29.2
1,4-pentanediol	0	76.9	59.1
1,5-pentanediol	0	14.1	7.6
2-methylfuran	11.2	22.7	11.2
Furfuryl alcohol	0	17.9	4.2
3-hexanol	0	27.6	12.8
Phenol	26.5	0	5.5
Carbon identified in liquid		7950	8603
TOC in liquid	14615	10279	12639
Carbon in liquid phase (%)		70	87