

## Supplementary Information

### Deep Eutectic Solvents as Green Catalysts for Carbohydrate Conversion and Synthesis of Furanic Compounds from Amazonian Cupuaçu Peel (*Theobroma grandiflorum*)

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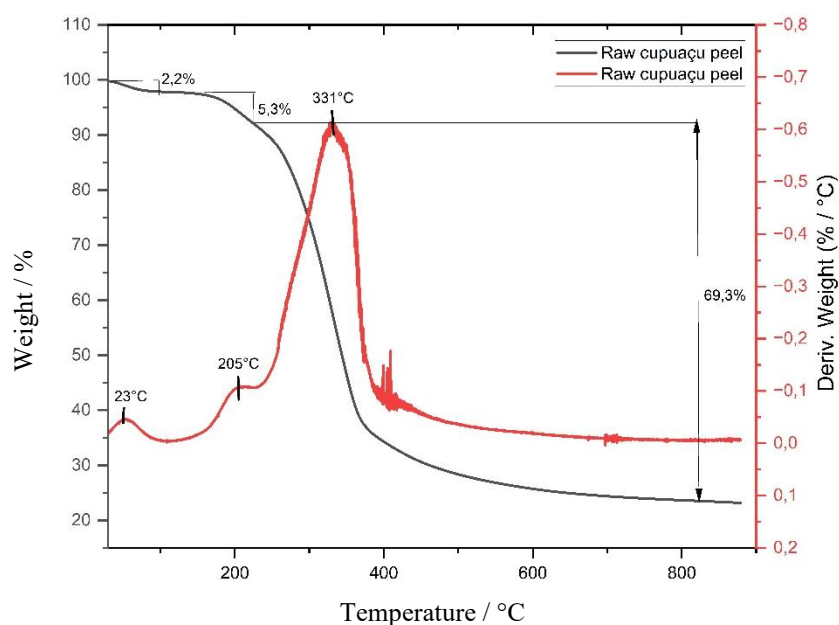
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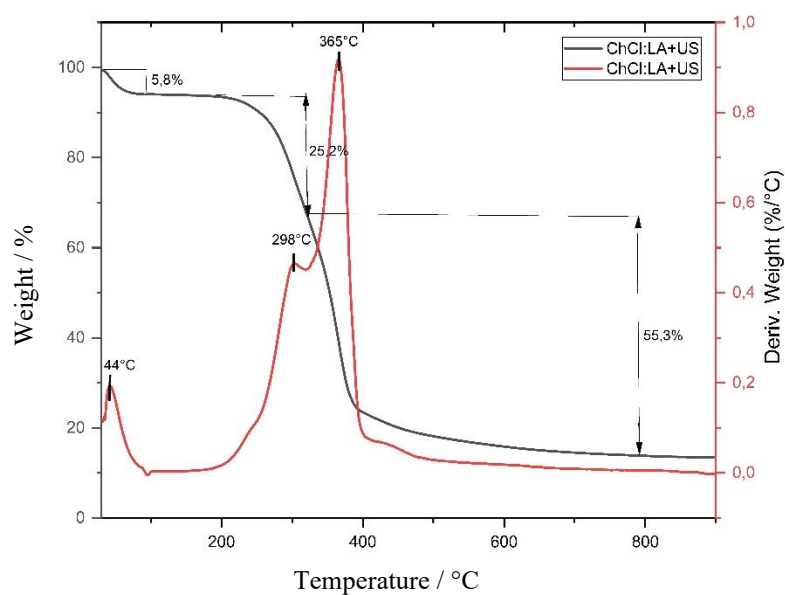
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## Thermogravimetric analysis (TGA)

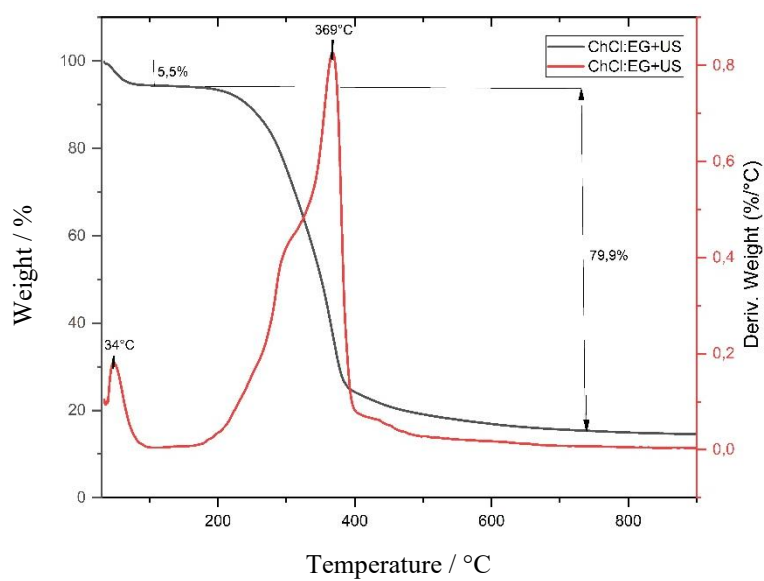
The thermogravimetric analysis (TGA) experiments were performed using a TGA Q5000 instrument (TA Instruments Inc., USA). The equipment usage condition was accessed by measuring the mass loss of a sample of well-known thermal decomposition profile ( $\text{CaC}_2\text{O}_4 \cdot \text{H}_2\text{O}$  99.9%). Thermal characterization analyses were carried out at a heating rate of  $10\text{ }^\circ\text{C min}^{-1}$  up to  $900\text{ }^\circ\text{C}$ . The sample mass used was approximately 7 mg. An inert nitrogen ( $\text{N}_2$ ) atmosphere was employed at a flow rate of  $25\text{ mL min}^{-1}$ . The sample was not dried before analysis, and no isothermal treatment was performed to remove possible volatile interferents (residual solvents and/or water). Data was processed using TA Universal Analysis 2000 software, version 4.5 (TA Instruments Inc., USA), and OriginPro 9.5 (Northampton, MA, USA).



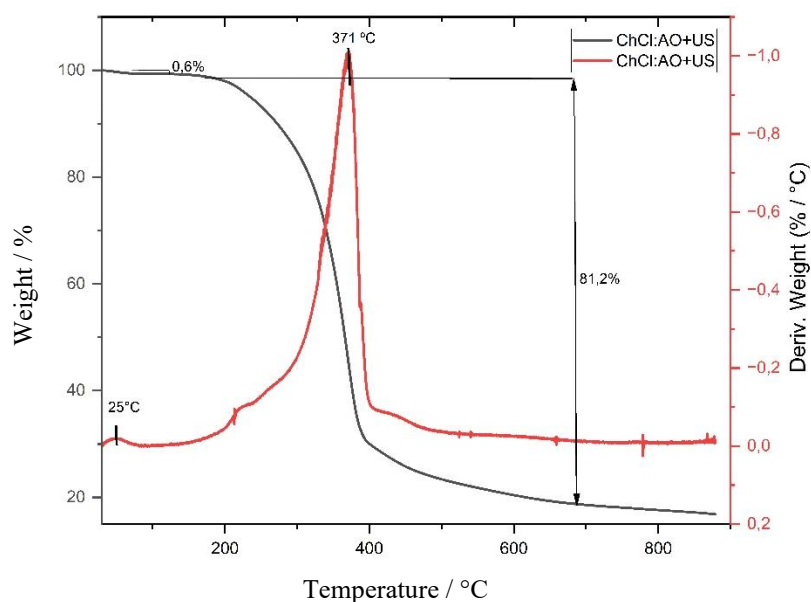
**Figure S1.** Overlaid TGA curves and their derivative (DTG) of raw cupuaçu peel.



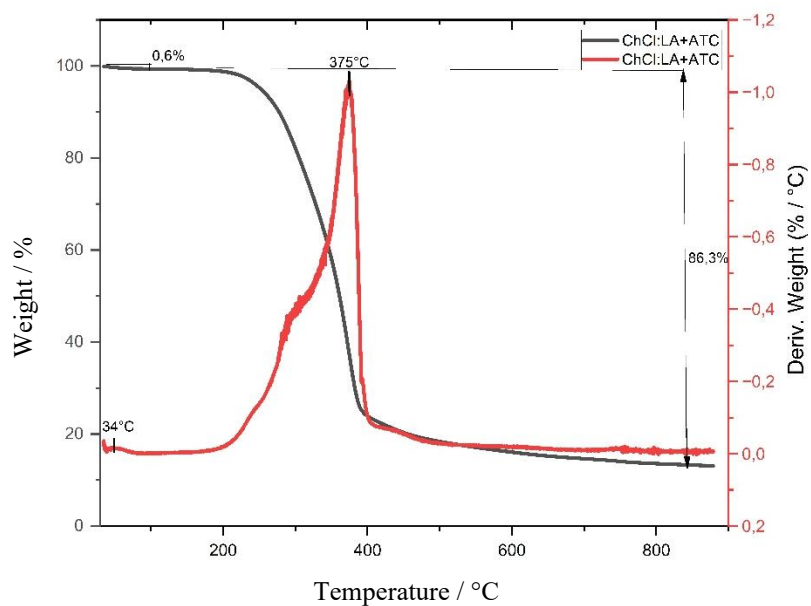
**Figure S2.** Thermogravimetric analysis (TGA) curves and their derivative (DTG) of biomass pretreated with DES (ChCl:LA) combining with ultrasound (US), highlighting the main stages of thermal degradation.



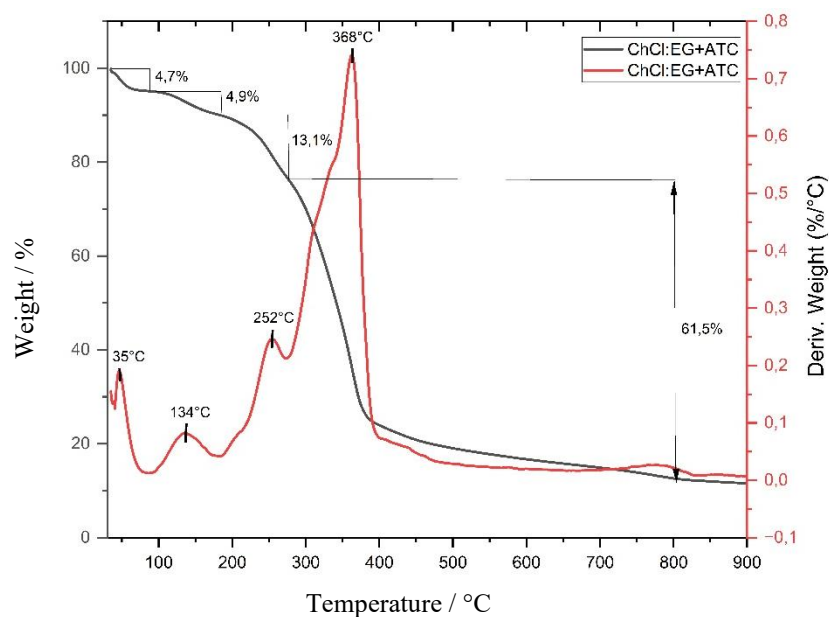
**Figure S3.** Thermogravimetric analysis (TGA) curves and their derivative (DTG) of biomass pretreated with DES (ChCl:EG) combining with ultrasound (US), highlighting the main stages of thermal degradation.



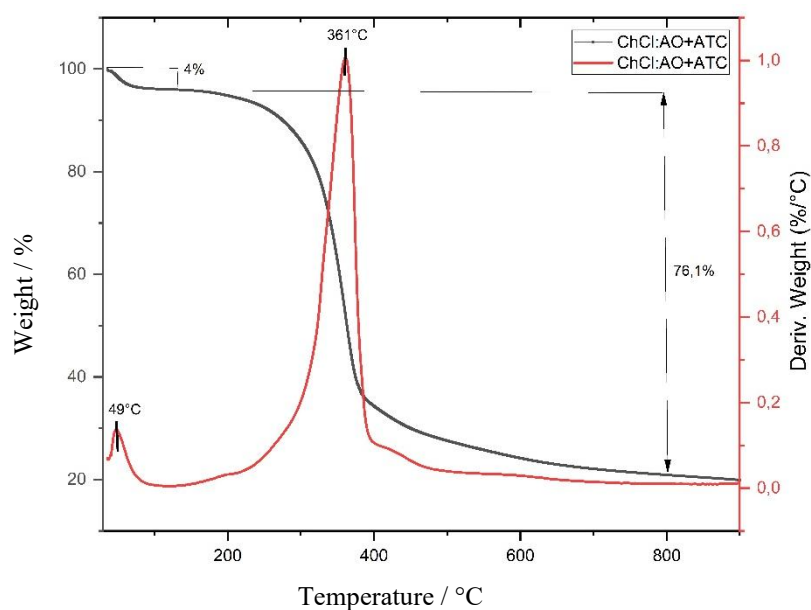
**Figure S4.** Thermogravimetric analysis (TGA) curves and their derivative (DTG) of biomass pretreated with DES (ChCl:OA) combining with ultrasound (US), highlighting the main stages of thermal degradation.



**Figure S5.** Thermogravimetric analysis (TGA) curves and their derivative (DTG) of biomass pretreated with DES (ChCl:LA) combining with ultrasound (ATC), highlighting the main stages of thermal degradation.



**Figure S6.** Thermogravimetric analysis (TGA) curves and their derivative (DTG) of biomass pretreated with DES (ChCl:EG) combining with ultrasound (ATC), highlighting the main stages of thermal degradation.



**Figure S7.** Thermogravimetric analysis (TGA) curves and their derivative (DTG) of biomass pretreated with DES (ChCl:AO) combining with ultrasound (ATC), highlighting the main stages of thermal degradation.