Supplementary file

In Plasma Catalytic Oxidation of Toluene Using Monolith CuO Foam as a Catalyst in a Wedged High Voltage Electrode Dielectric Barrier Discharge Reactor: Influence of Reaction Parameters and Byproduct Control

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Table S1. Specific input energy (SIE) with different input power and peak voltage.

Peak voltage (kV)	8	10	12	15	18	20	22	24
SIE (J/L)	70.8	115.6	151.2	332.2	602.6	696.5	799.8	856
Input power (W)	6.9	8.8	12.5	20.2	37.5	45.2	49.5	51.4

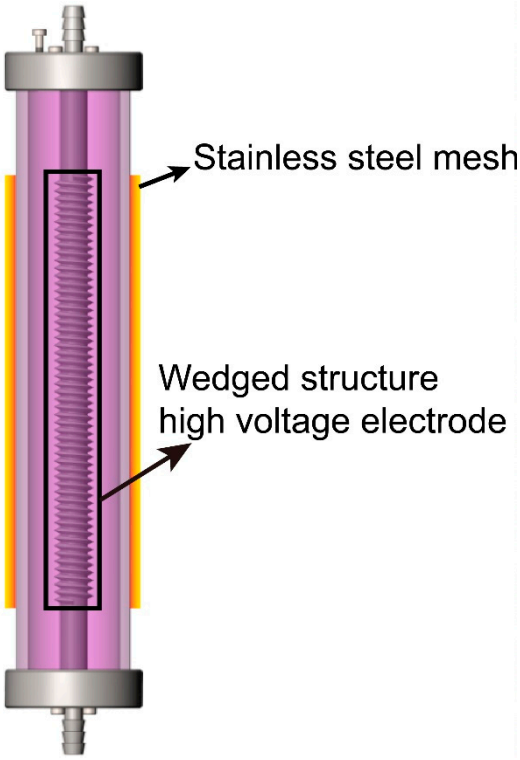

Figure S1. Enlarged illustration of the wedged high electrode and DBD reactor.

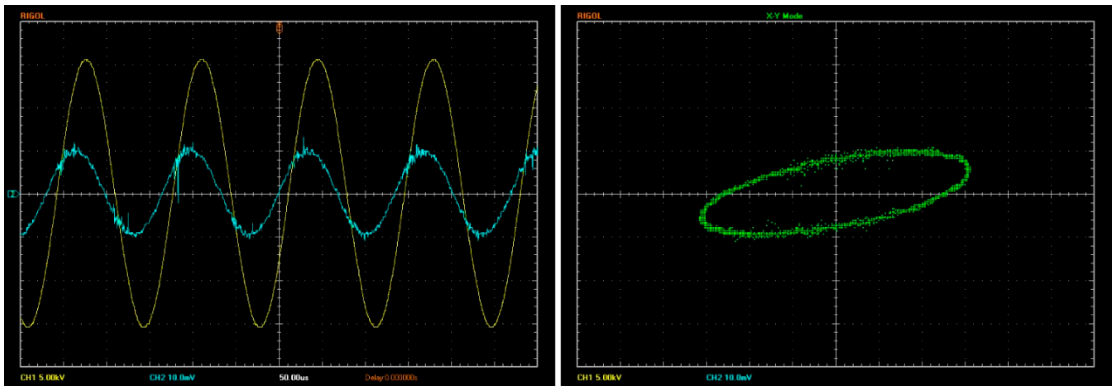

Figure S2. Waveforms of applied voltage and V-Q Lissajous diagrams of IPC process at 15 kV peak voltage.

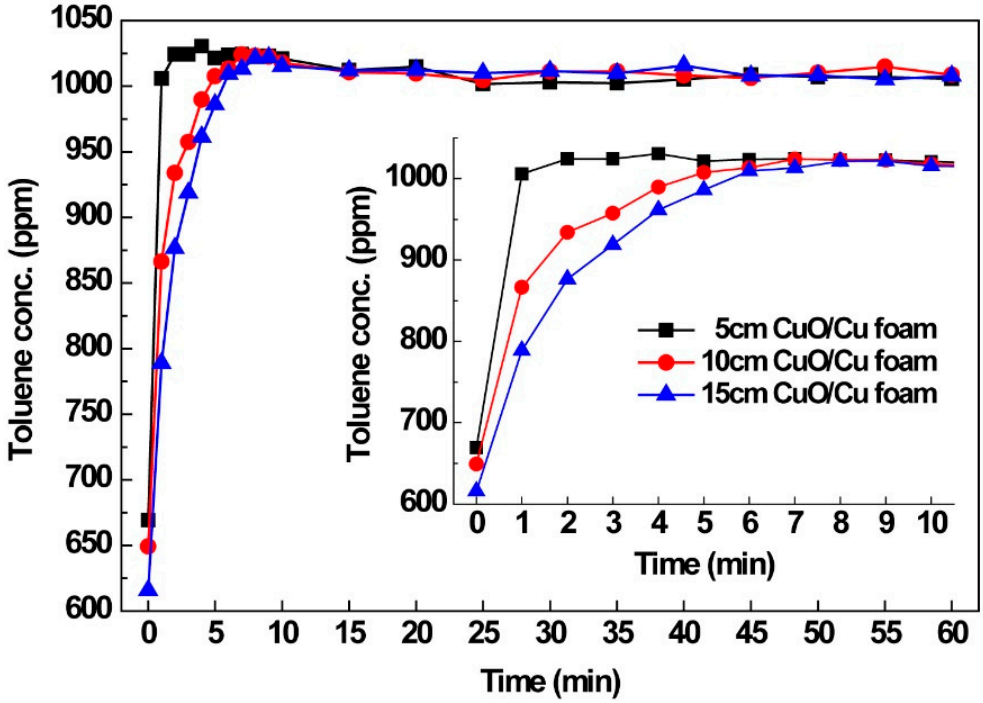

Figure S3. Toluene adsorption balance of different CuO foam loading in the IPC reactor.

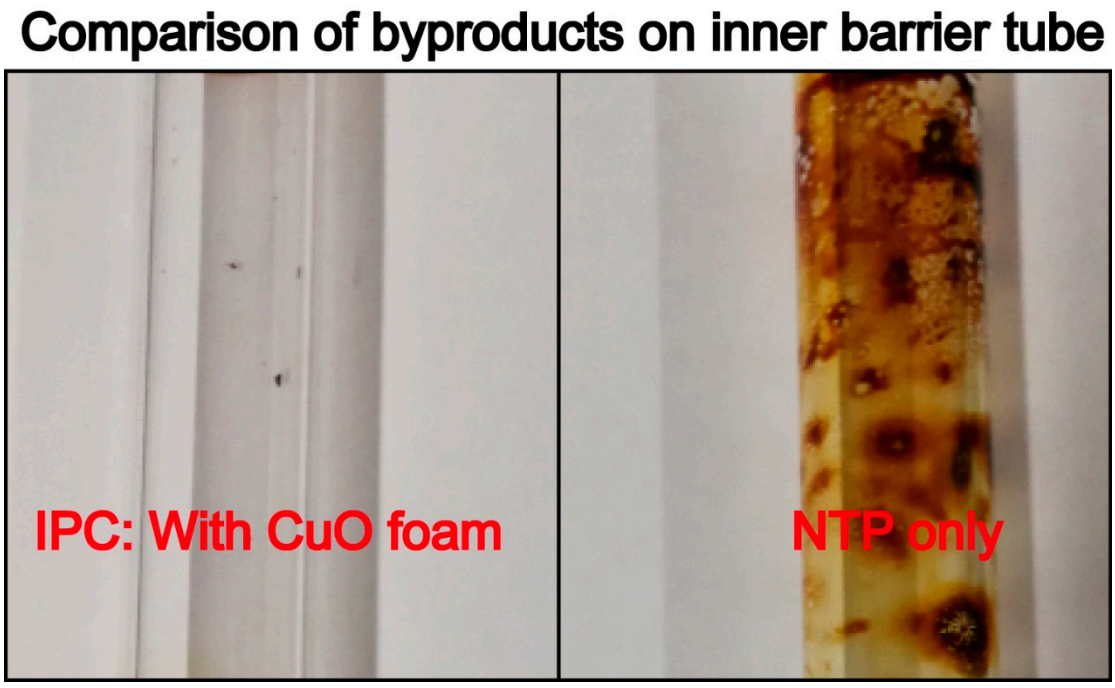

Figure 4. Toluene decomposition byproduct on inner barrier tube comparison of the NTP and IPC process.

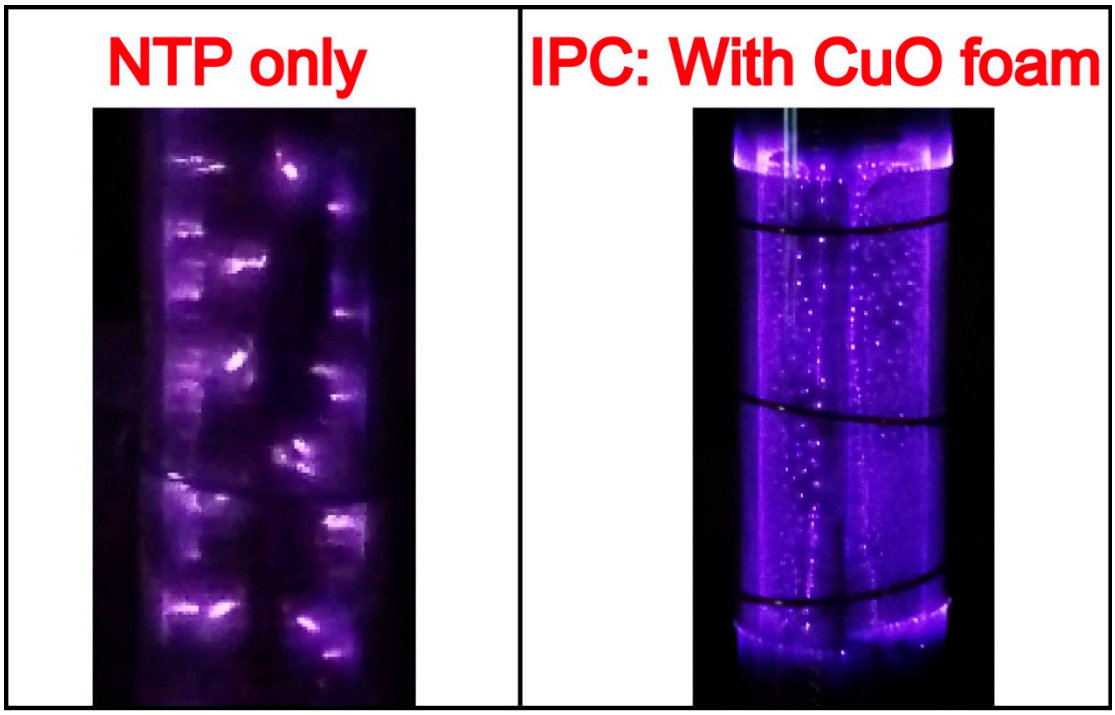

Figure 5. Discharge phenomenon of DBD process with (**right**) and in the absence of CuO foam (**left**) as a catalyst.