

Supplementary Information

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Tuning SiO₂/Al₂O₃-NiMo catalyst properties via KHP-template synthesis for crude palm oil hydrocracking

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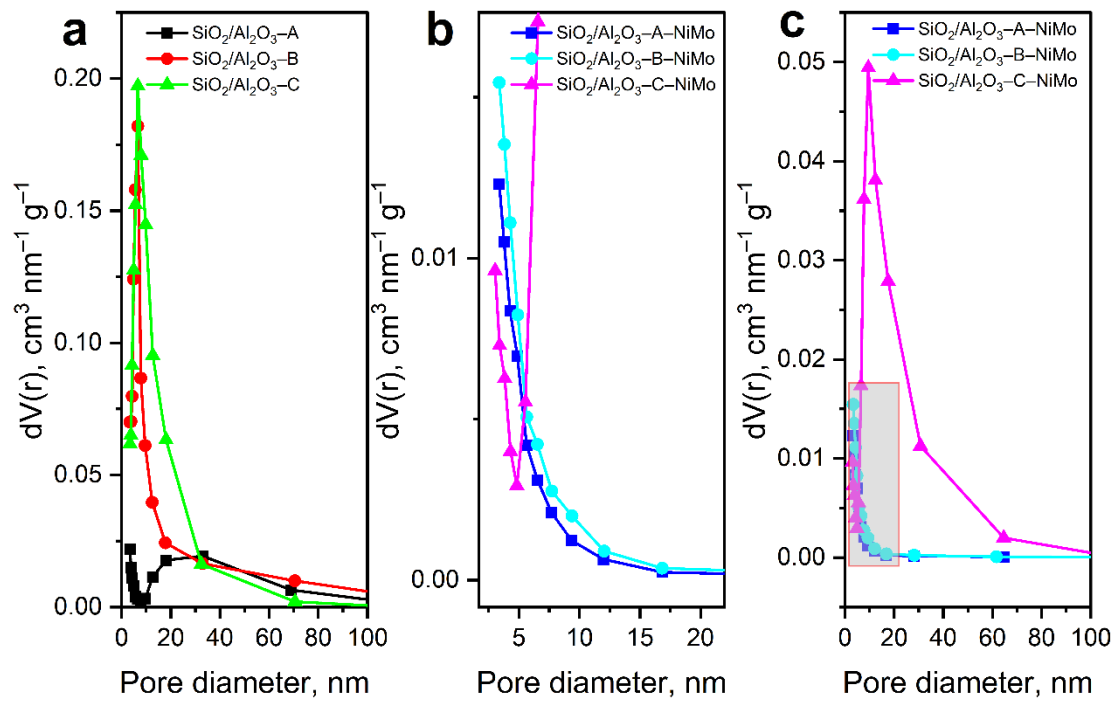


Figure S1. a) BJH desorption plots of $\text{SiO}_2/\text{Al}_2\text{O}_3$ b) BJH desorption plots of $\text{SiO}_2/\text{Al}_2\text{O}_3$ -NiMo c) enlargement of $\text{SiO}_2/\text{Al}_2\text{O}_3$ -NiMo-A, and -B

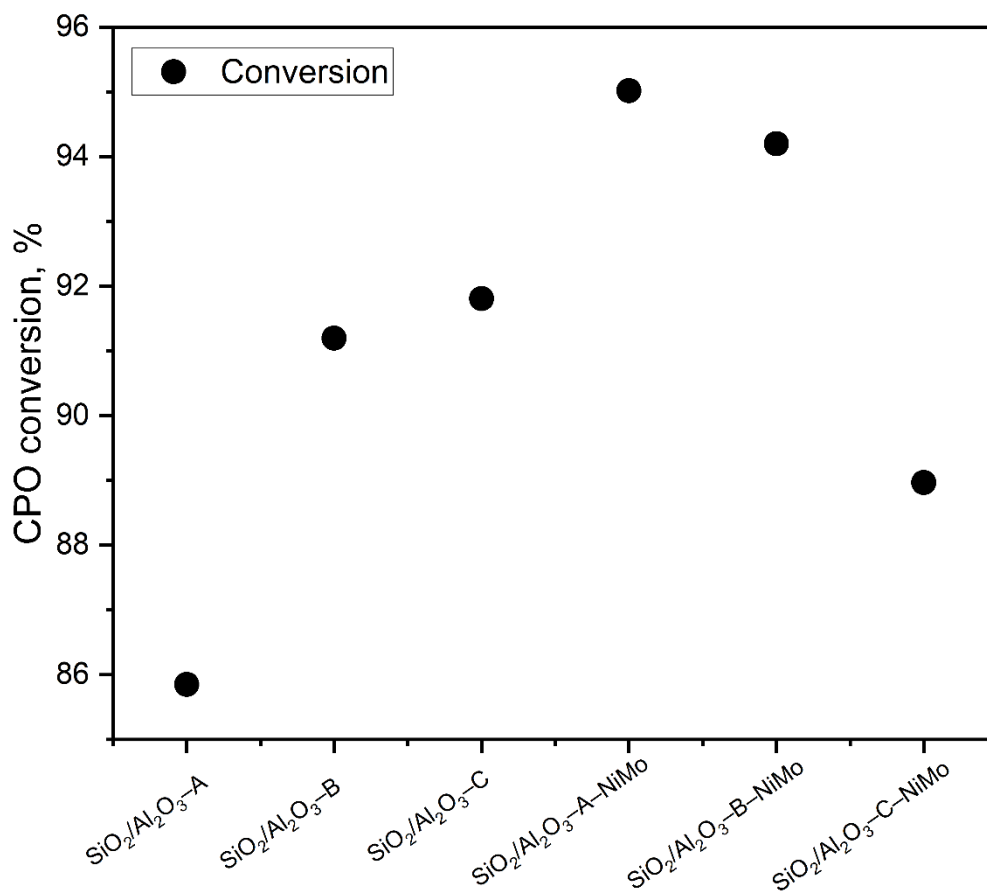


Figure S2. Catalytic activity of hydrocracking in terms of CPO conversion over SiO₂/Al₂O₃ and SiO₂/Al₂O₃-NiMo catalysts with varying aluminium weights.

Table S1. Average particle size in μm scale of $\text{SiO}_2/\text{Al}_2\text{O}_3$ and $\text{SiO}_2/\text{Al}_2\text{O}_3\text{-NiMo}$ at varying aluminium weights

Catalyst	Average particle size, μm
$\text{SiO}_2/\text{Al}_2\text{O}_3\text{-A}$	11.96 ± 0.01
$\text{SiO}_2/\text{Al}_2\text{O}_3\text{-B}$	13.45 ± 0.02
$\text{SiO}_2/\text{Al}_2\text{O}_3\text{-C}$	15.42 ± 0.03
$\text{SiO}_2/\text{Al}_2\text{O}_3\text{-A-NiMo}$	4.32 ± 0.02
$\text{SiO}_2/\text{Al}_2\text{O}_3\text{-B-NiMo}$	5.26 ± 0.05
$\text{SiO}_2/\text{Al}_2\text{O}_3\text{-C-NiMo}$	7.82 ± 0.02