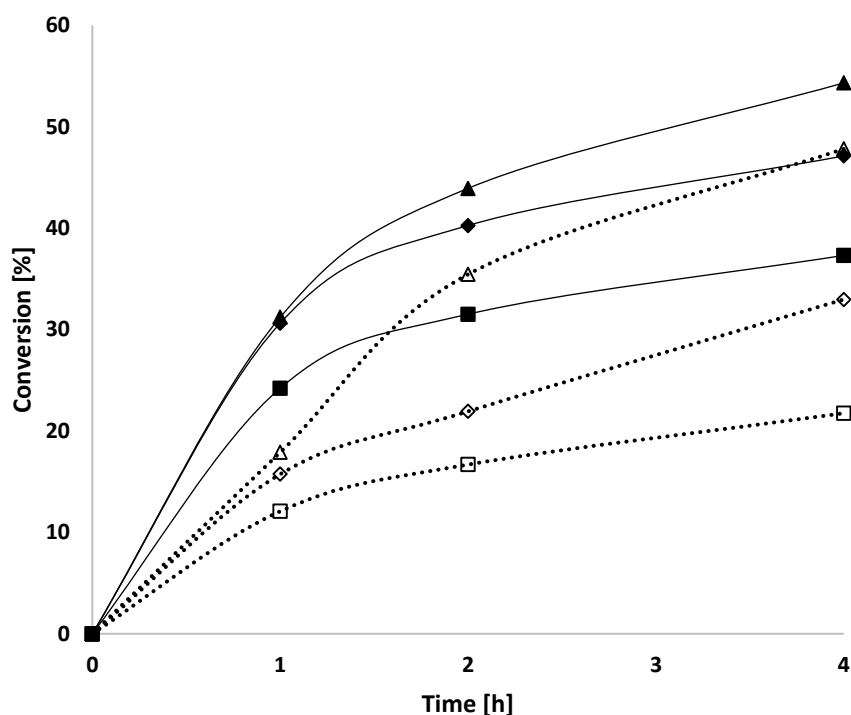


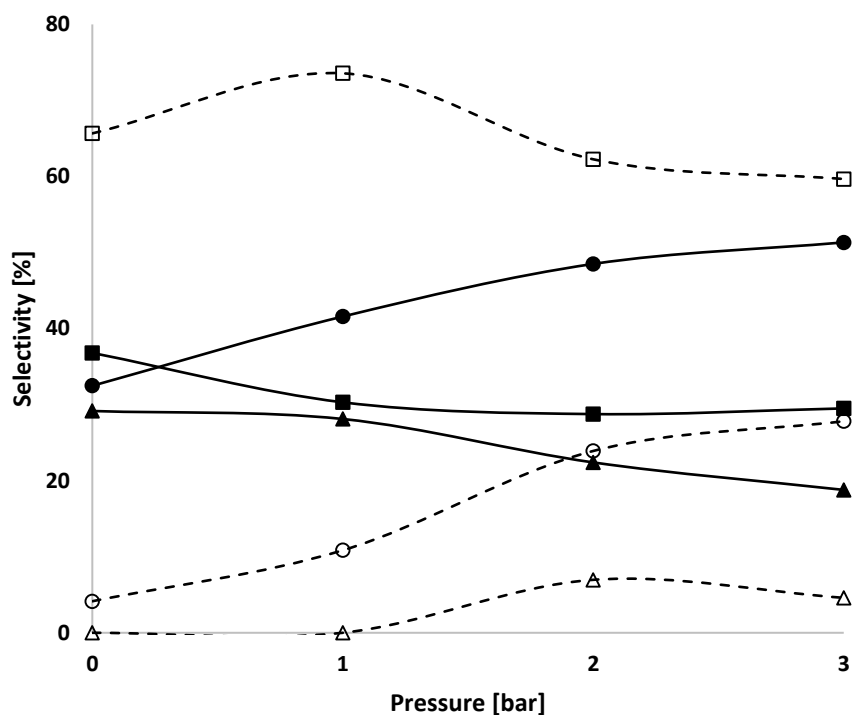
Electronic Supplementary Information (ESI)

Cinnamyl alcohol oxidation using supported bimetallic Au-Pd nanoparticles: an investigation of autoxidation and catalysis

Emilia Rucinska, Peter J. Miedziak, Samuel Pattison, Gemma L. Brett, Sarwat Iqbal, David J. Morgan, Meenakshisundaram Sankar and Graham, J. Hutchings.*



ESI Figure 1 Oxidation of cinnamyl alcohol under different oxygen pressure carried out in the presence and absence of the catalyst as a function of reaction time. Reaction conditions: 1% AuPd/TiO₂(Imp), 10 mg; oxygen pressure, 1-3 bar; temperature, 120 °C; 0.5 M cinnamyl alcohol in toluene. **Full figures-** reactions carried out in the absence of a catalyst: 1 bar (■); 2 bar (◆), 3 bar (▲); **empty figure-** reactions carried out in the presence of a catalyst: 1 bar (□); 2 bar (◇); 3 bar (△)



ESI Figure 2 Oxidation of cinnamyl alcohol under different oxygen pressure carried out in the presence and absence of the catalyst. Selectivity to cinnamaldehyde and benzaldehyde as a function of oxygen pressure. Reaction conditions: time, 4 hours; 1% AuPd/TiO₂ (Imp), 10 mg; oxygen pressure, 1-3 bar; temperature, 120 °C; 0.5 M cinnamyl alcohol in toluene. **Full figures-** reactions carried out in the absence of the catalyst: CinnALD (■); BenzALD (●); BenzACID (▲); **empty figure-** reactions carried out in the presence of the catalyst: CinnALD (□), BenzALD (○); BenzACID (△)