

The reaction is exothermic. Draw the potential energy vs reaction coordinate diagram for this mechanism, labelling all species that can be isolated.

**Marks**  
**2**

**From 2008-N-6, the mechanism involves two steps: a slow first step and a fast second step. As the first step is rate determining, it has a higher activation energy. As the reaction is exothermic overall, the products have lower enthalpy than the reactants.**

