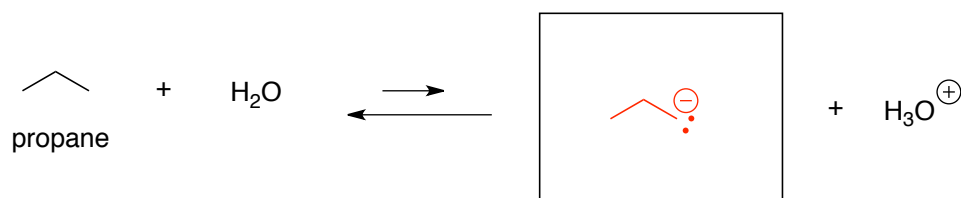
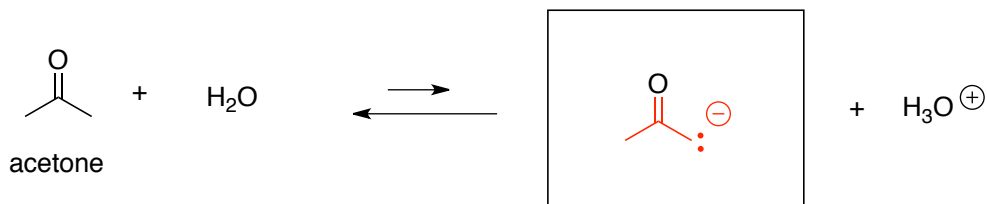


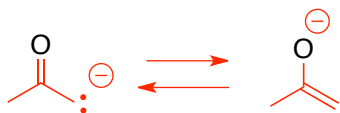
Quiz 2. Tuesday Morning (Friday Conversion)

Name:

1) Show the missing structure in the following equation. (3 points)



b) The pK<sub>a</sub> of acetone is 22, while the pK<sub>a</sub> of propane is 51. Using the structures you drew in 1a), explain this difference in pK<sub>a</sub> (3 points).



**Lower pK<sub>a</sub> means more acidic. The conjugate base of acetone has resonance stability, and so it is more stable than the conjugate base of propane, which does not have any resonance stabilization.**

2) The following is an elimination reaction. Would this reaction classify as an E1 or E2 reaction? Using curved arrows, show a mechanism that is consistent with your classification (4 points)

