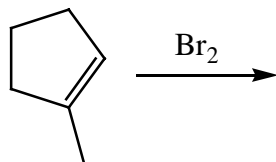


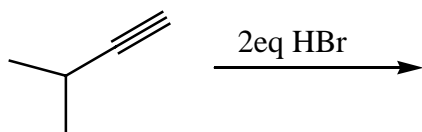
Chem 141
Problem-Set
Wednesday 29th November 2006.

1) Predict the outcome of the following reactions and show a FULL MECHANISM for each reaction.

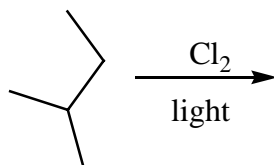
a)



b)

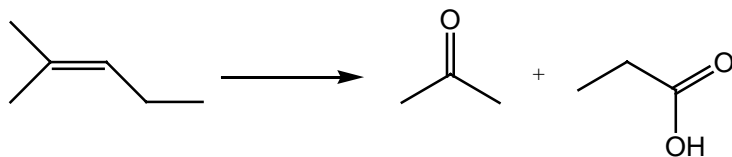


2) What are the four possible monochlorination products of the following radical reaction?

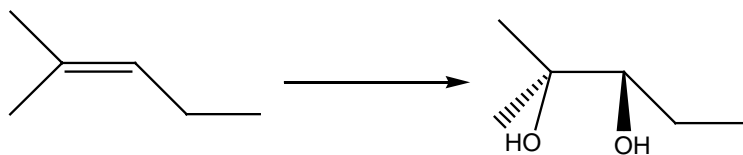


3) Add reactant, reagents or products to complete the following reactions.

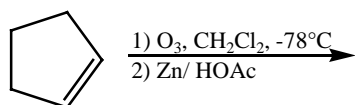
a)



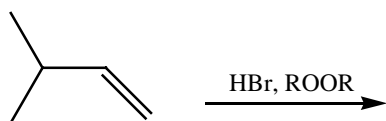
b)



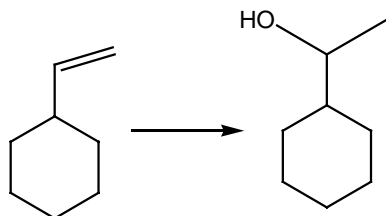
c)



d)



e)



4) What is the order of stability for halogen radicals and how does it affect the reactivity with branched alkanes? Provide illustrations.