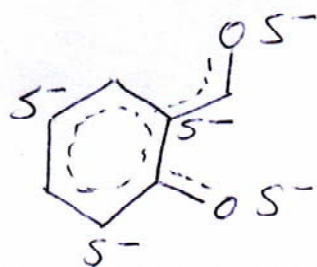
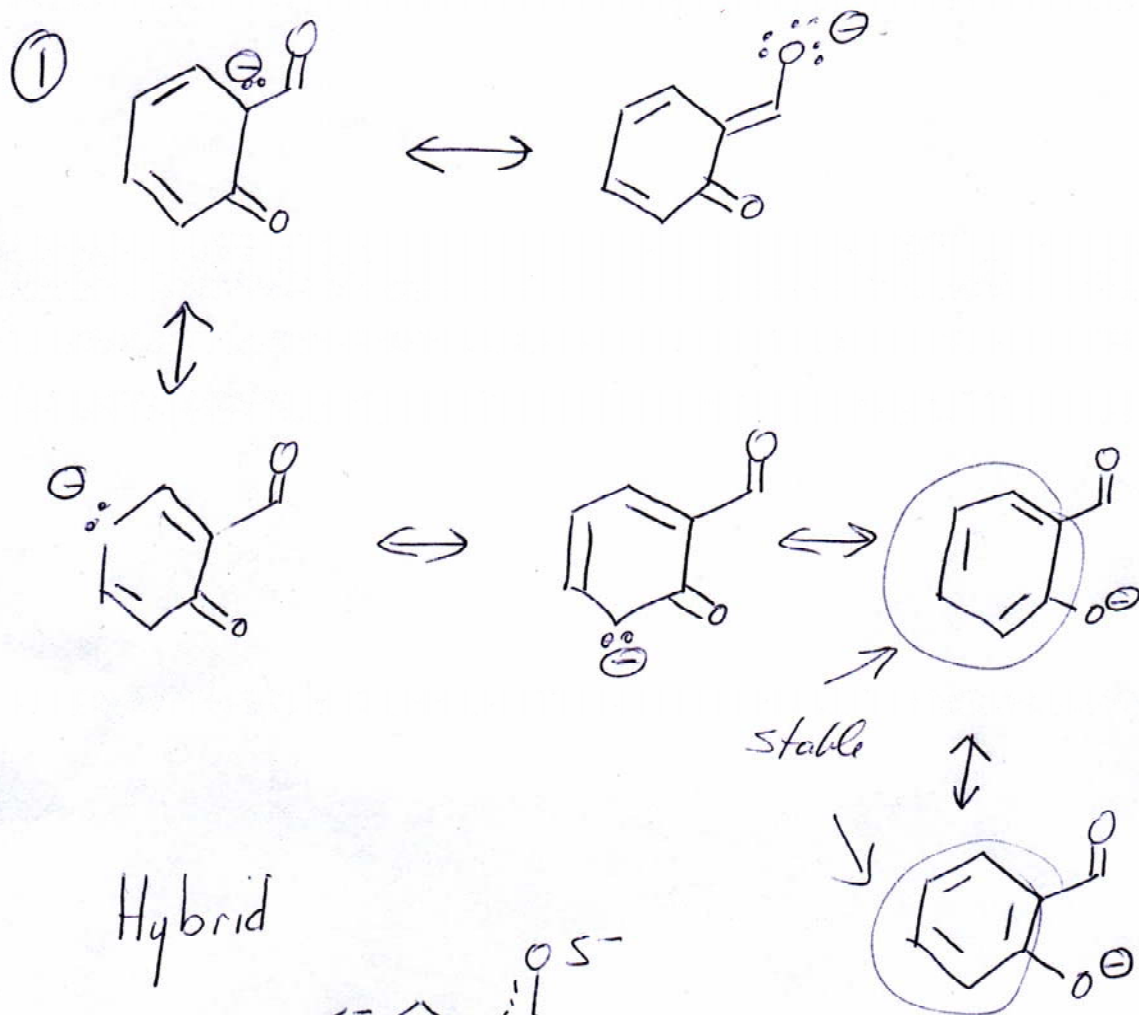


MNS

$\frac{1}{5}$

Problems from Friday, January 23

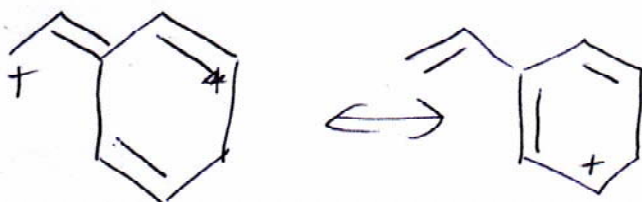
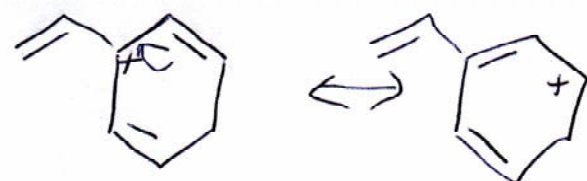


structures with
benzene rings
structures with
negative charge on
oxygen make large contribution
to hybrid.

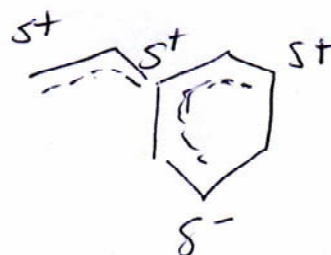
MNS

2/5

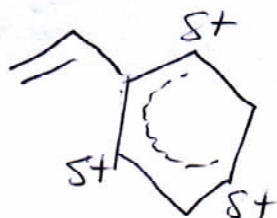
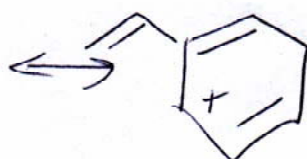
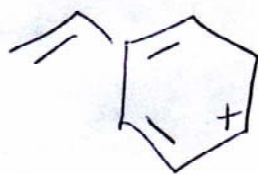
(2)



hybrid



OR

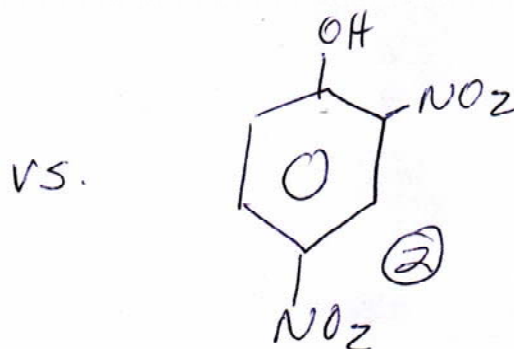
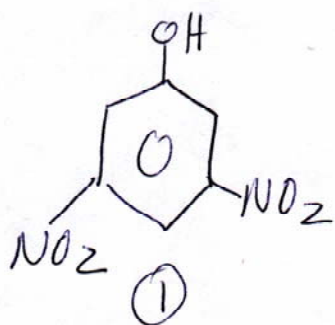


What a difference
position
MAKES!

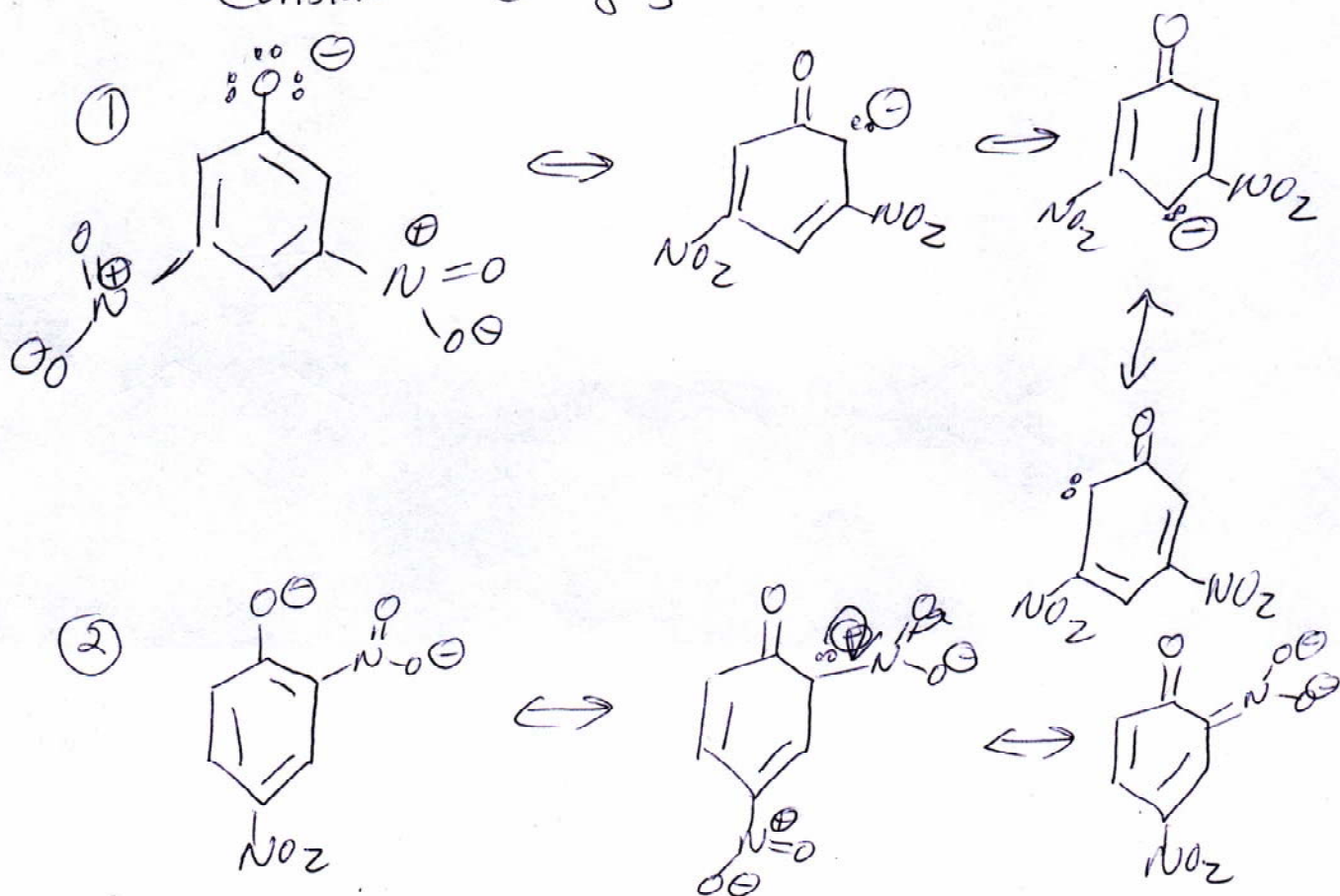
MNS

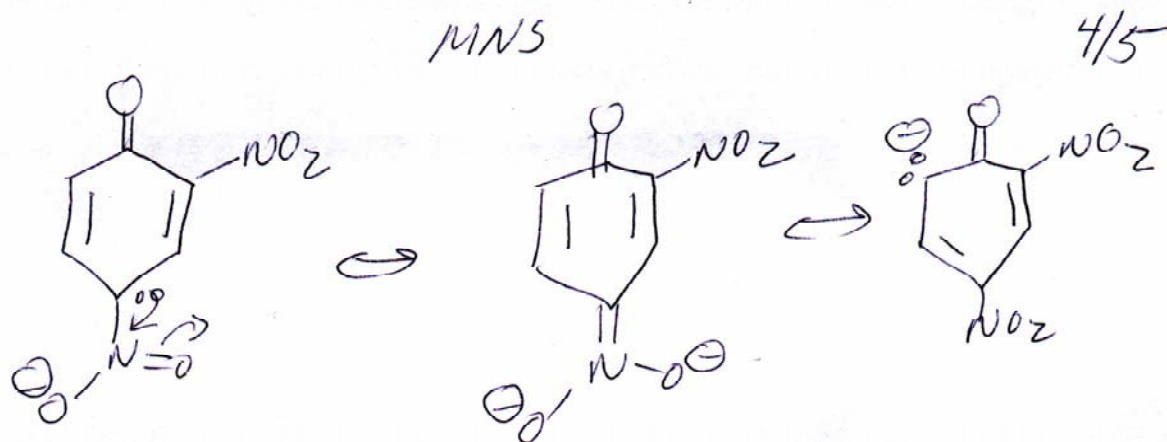
3/5

Which has higher pK_a



Consider Conjugate BASES





② Has more resonance forms

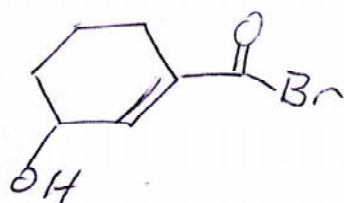
∴ $\ominus$ charge is spread out over more atoms. More delocalized charge = more diluted charge = Weaker base

Weaker base has stronger conjugate acid

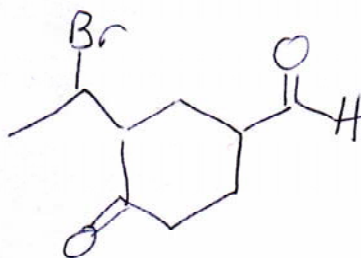
∴ 2 is stronger acid

5/5

Nomenclature



3-hydroxy-1-cyclohexene carboxyl bromide



3-(2-bromoethyl)-4-oxocyclohexane carbaldehyde