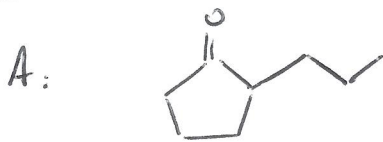
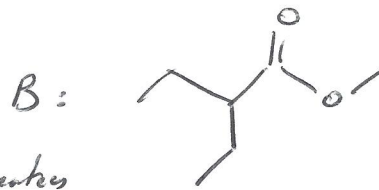


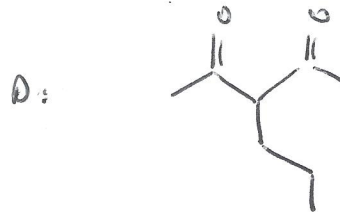
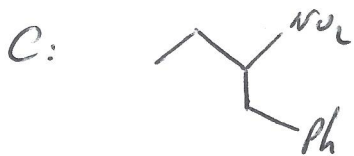
Exercice 3:



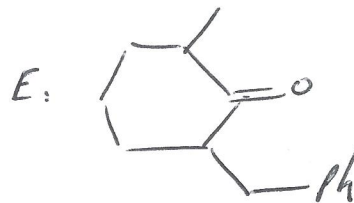
à l'hydrolyse de enolate



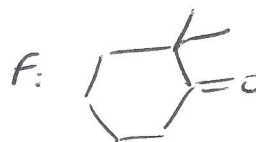
peu apparentes



E: passer par enolate au lieu

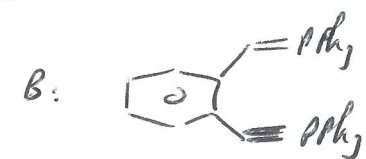
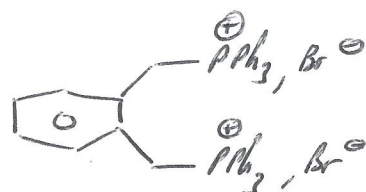


F: passer par enolate thermodynamique

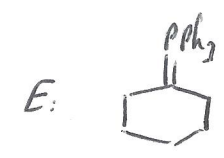
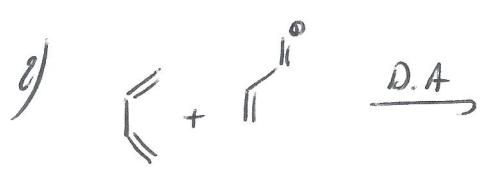
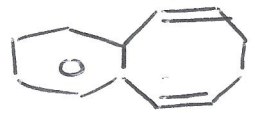


Exercice 5:

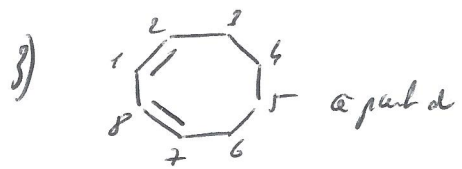
1) A:



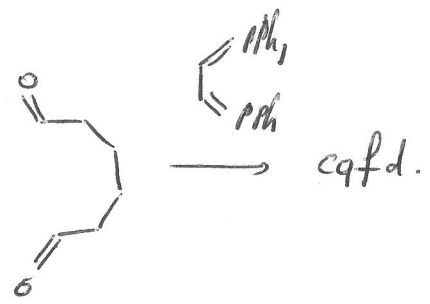
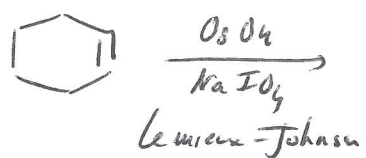
C:



recherche de Wittig



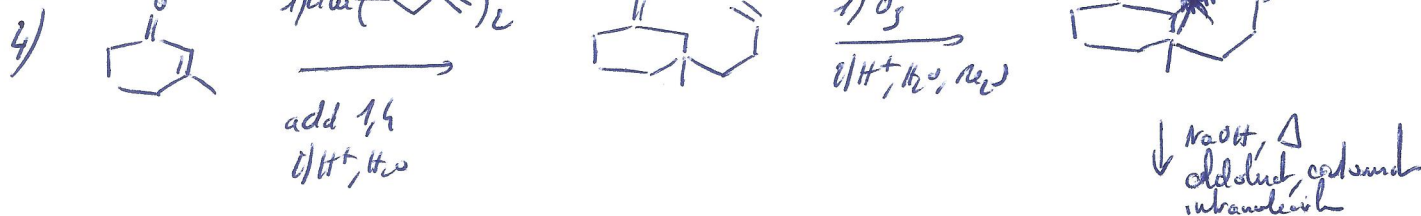
à part d



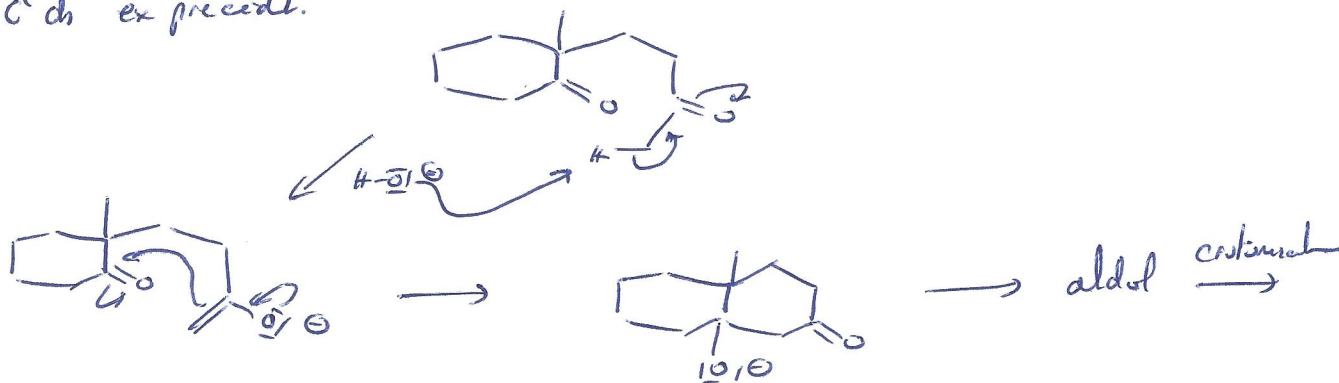
cf d.

TD carbanion nucleophile

sur ex A:



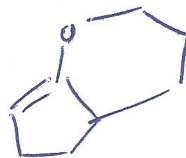
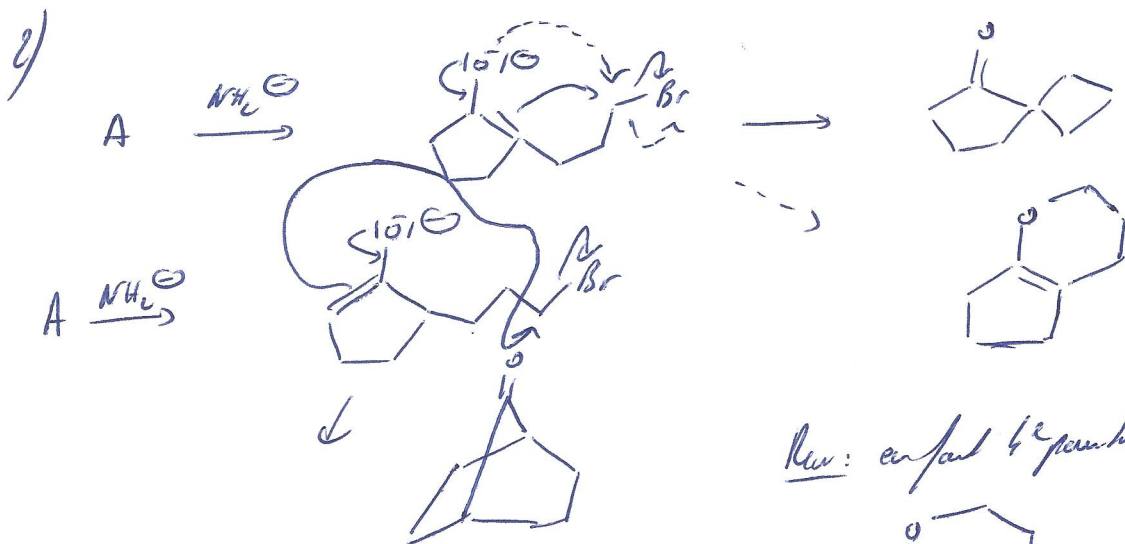
5) Premier cycle: premier per enolate thermodynamique ce-soluit protique, p.s. add 1,4
 \vec{c} de ex precedt.



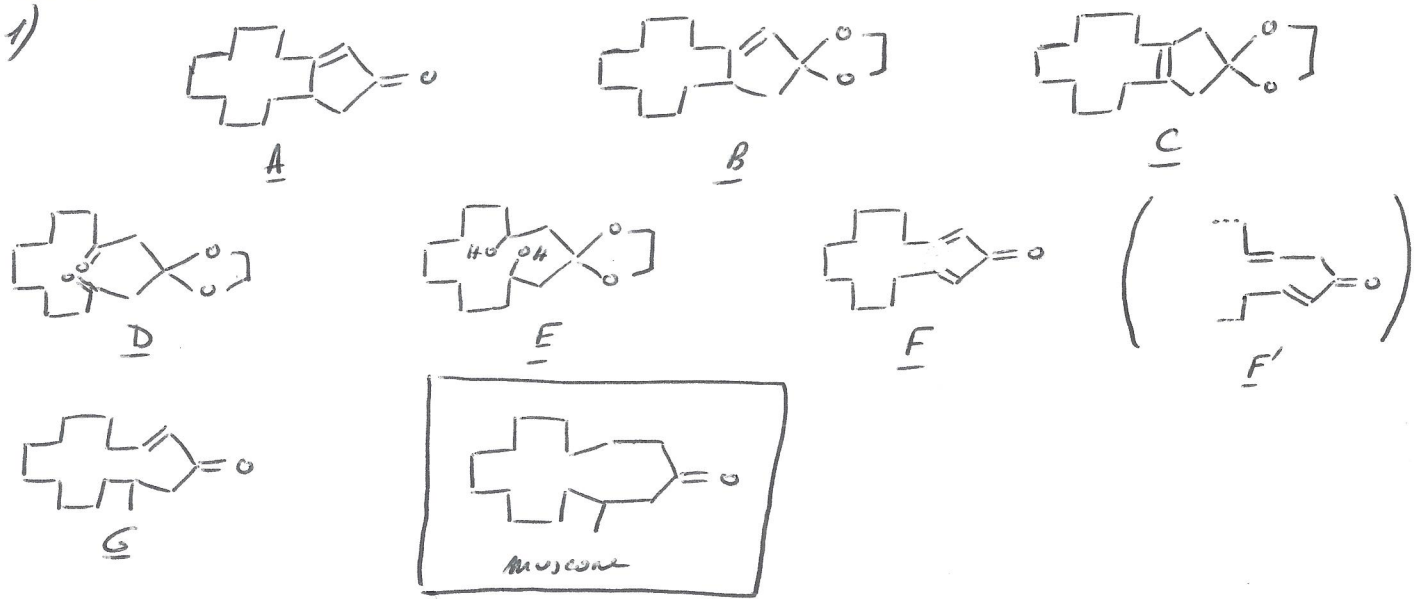
X Exercice C:



Si on attend longtemps, on obtiendra C un mélange racémique



Exercice 8:



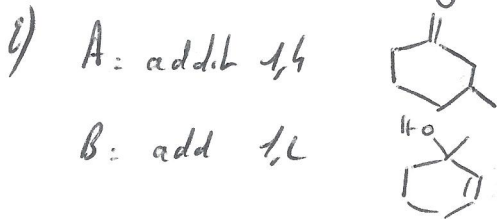
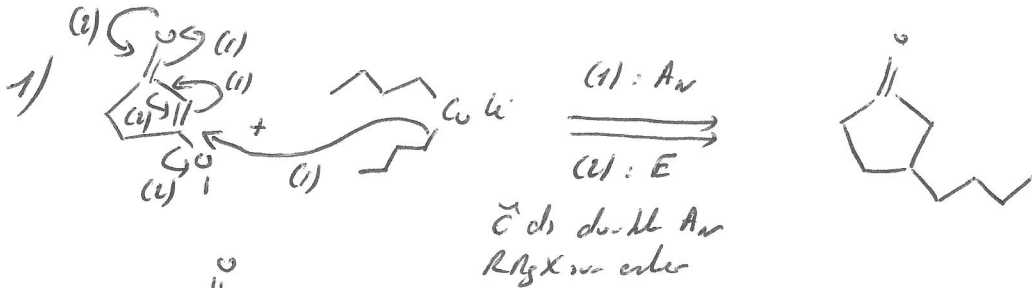
2) protection de $C=O$ pour permettre :

* isomérisation $B \rightarrow E$ avec formation possible d'un alcène + stable car plus substitués sans conjugaison dans B.

* réduction de deux $C=O$ sans réduction de celui protégé : $D \rightarrow E$

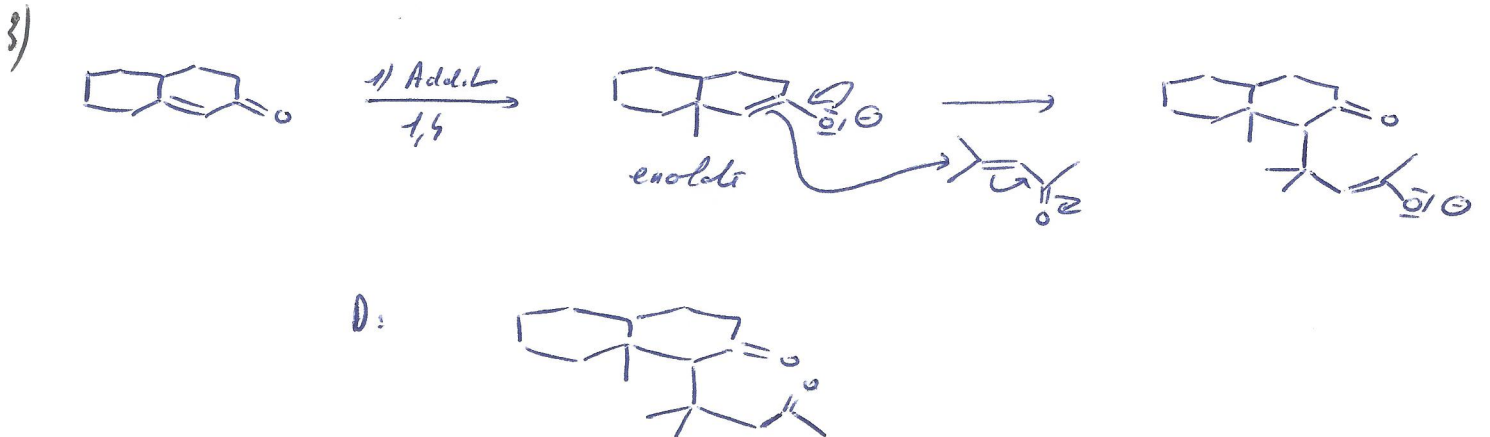
3) F est majoritaire car + de conjugaison. On obtient le produit le plus stable car sans contrôle thermodynamique

Exercice 11



bande $C=O$ IR : $\approx 1700 \text{ cm}^{-1}$

bande OH IR : 3600 cm^{-1} fin (OH libre) + $3200-3400 \text{ cm}^{-1}$ large (OH lié)



für examen 11:

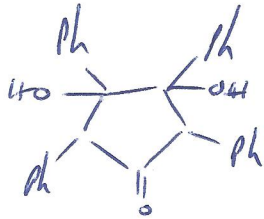
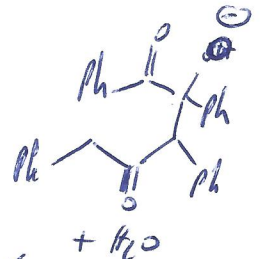
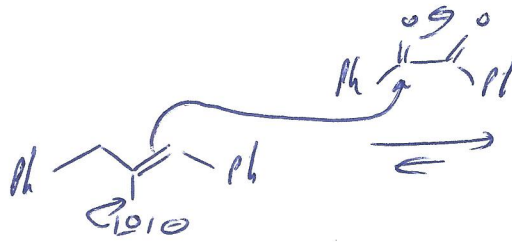
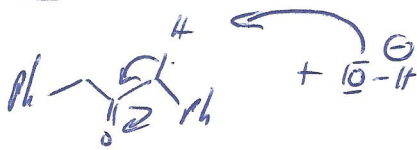
TD cationisches nucleophil

3) C:

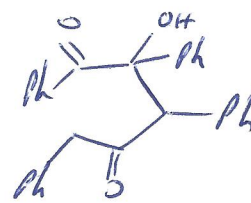


condit: NaOH Δ

Reaktion:



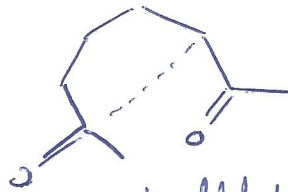
idem
↔
anti
↔
contra



+ H₂O
↔
protonen

↙
pro double
crotonisation

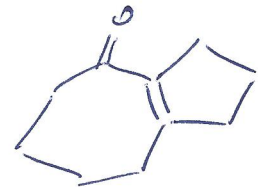
4) retro crotonisation, retro aldol →



↙ aldol, croton

CQFD.

aldol
↔
crotonal



↙ H₂, N. Rosey, 1 bar

5)

