

ANSWER SHEET – Chem 263 A2 Midterm Exam – All Answers on This Document – October 24, 2013

<u>Print</u> Last (Family) Name	First Name	Signature	ID Number (if known)	Leave Blank (Score)
<b>KEY</b>				<b>200 points</b>

Section I.A. page 2	1.	2.	3.	4.

Section I.A. p2	5.	<b>cis (or Z)-11-eicosen-1-ol - 2 pts wrong or no stereochem</b>		
page 3	6.	<b>4,8,12-trimethyl-1,4E,7E,11-tridecatetraene (or all trans OK)</b>		
page 3	7.	<b>4-hydroxy-3-methoxybenzaldehyde (or Vanillin) substituents need not be alphabetical</b>		

Section I.A. page 3	8.	9.	10.

Section I.B. p4	11. <b>enantiomers</b>	12. <b>diastereomers</b>	13. <b>identical</b>	14. <b>identical</b>	15. <b>enantiomers</b>
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Section I.C. p5	16. <b>19</b>	17. <b>19</b>	18. <b>6</b>	19. <b>amino</b>	20. <b>amide</b>	21. <b>2</b>	22. <b>S</b>	23. <b>true</b>	24. <b>acid</b>	25. <b>false</b>
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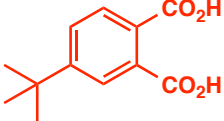
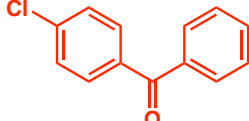
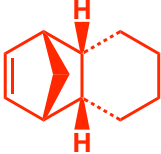
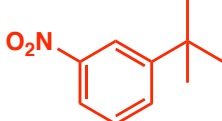
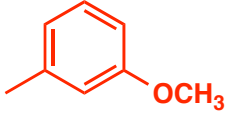
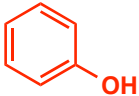
Section IIA. p6	1. <b>6</b>	2. <b>doublet</b>	3. <b>2</b>	4. <b>true</b>	5. <b>true</b>
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Section IIBC p6	6. <b>b f</b>	7. <b>h k</b>	8. <b>6</b>	9. <b>6</b>
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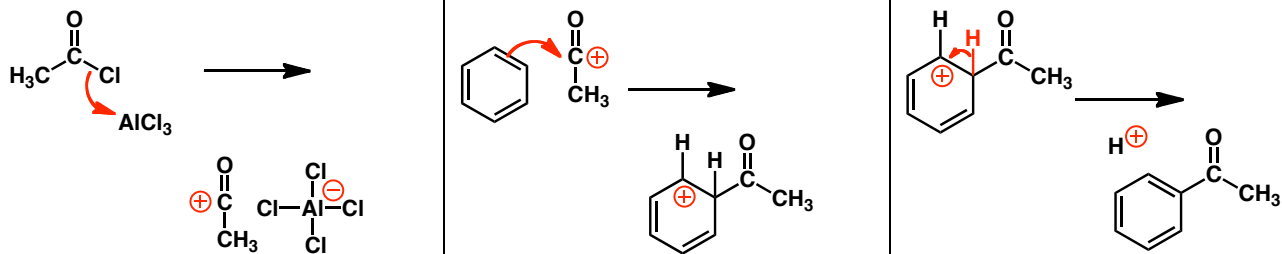
Section IID p7				
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Section III.A p8	1. <b>a process wherein all bonds form and break at same time</b>
page 8	2. <b>lowest unoccupied molecular orbital</b>
page 8	3. <b>molecule that is a non-superposable mirror image of another</b>
page 8	4. <b>number of protons in the nucleus of an atom</b>
page 8	5. <b>a discrete arrangement of bonded atoms</b>
page 8	6. <b>substance that accepts a pair of electrons</b>
page 8	7. <b>non-bonded interaction (repulsion)</b>
page 8	8. <b>pictures of same molecule made by moving only electron positions</b>

Section III.B page 9	9. <b>rubber</b>	10. <b>cholesterol</b>	11. <b><math>\beta</math>-carotene</b>	12. <b>vitamin D</b>	13. <b>DDT</b>
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Section IVA page 10	1. 	2.  ortho also OK	3.  2 pts stereochem	4. 	5. 
Section IVB page 11	6. <b>HBr</b>	7. <b>heat</b>	8. <b>Zn (Hg) and HCl</b>	9. <b>first Br<sub>2</sub> FeBr<sub>3</sub> or other Lewis acid then HNO<sub>3</sub> and H<sub>2</sub>SO<sub>4</sub></b>	10. <b>Sn HCl NaNO<sub>2</sub> HCl</b> 

Section V.A p 12	1. <b>f</b>	2. <b>g</b>	3. <b>c</b>	4. <b>d</b>	5. <b>p</b>
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Section V.B page 13	
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