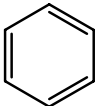
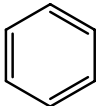
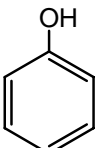
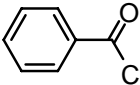


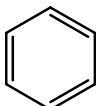
Chapter 17 Worksheet 02

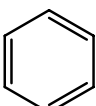
Reactions: Please provide the major product or the reagents for the reactions below.

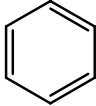
1. 
 1. CO/HCl/AlCl₃/CuCl
 2. H₂SO₄, HNO₃
 3. Zn(Hg), aq. HCl
 4. NaOH

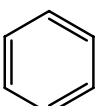
2. 
 1. Cl-C(CH₃)₃ / AlCl₃
 2. Cl₂, FeCl₃
 3. (2)NaOH, 350°C
 4. H⁺

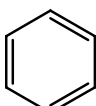
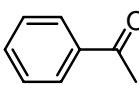
2. 
 1. , AlCl₃
 2. Fuming H₂SO₄

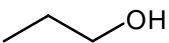

4. 
 1. HNO₃, H₂SO₄
 2. Sn, aq. HCl
 3. NaOH
 4. CH₃(CH₂)₂Cl, AlCl₃

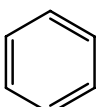
5. 
 1. Br₂, FeBr₃
 2. (2)NaOH, 350°C
 3. Br-CH₂CH₂CH₃

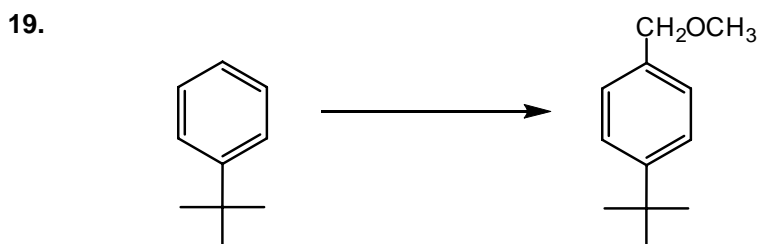
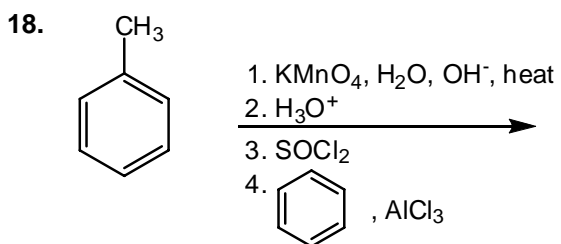
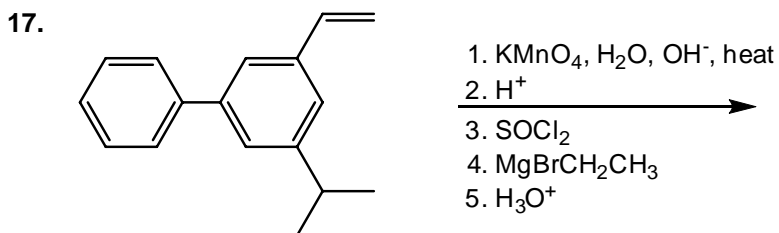
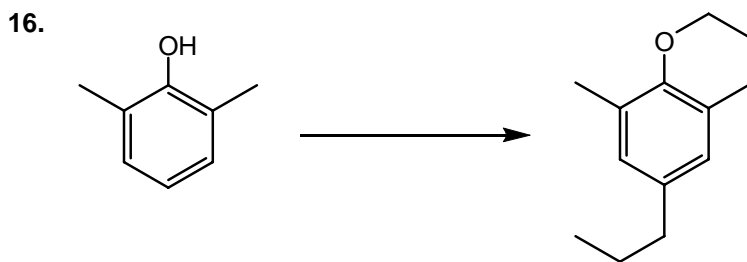
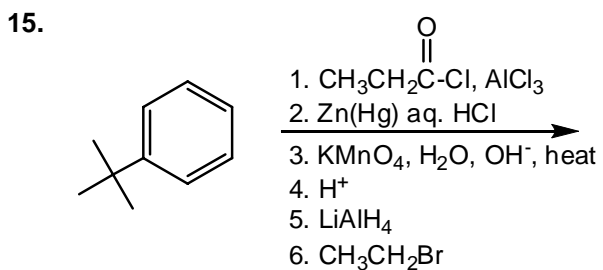
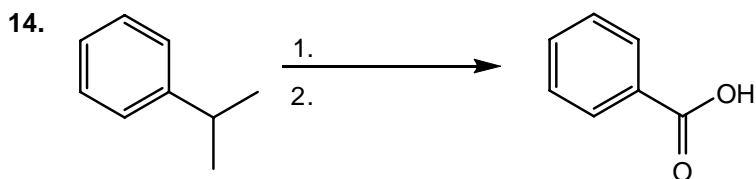
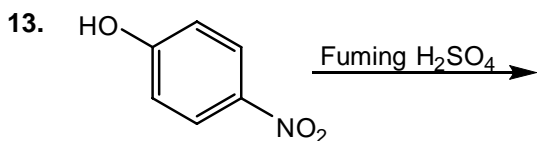
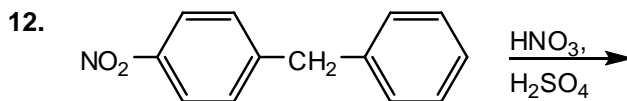
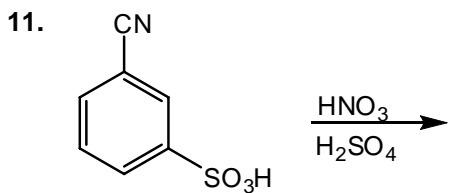
6. 
 1. Br₂, FeCl₃
 2. NaNH₂/NH₃

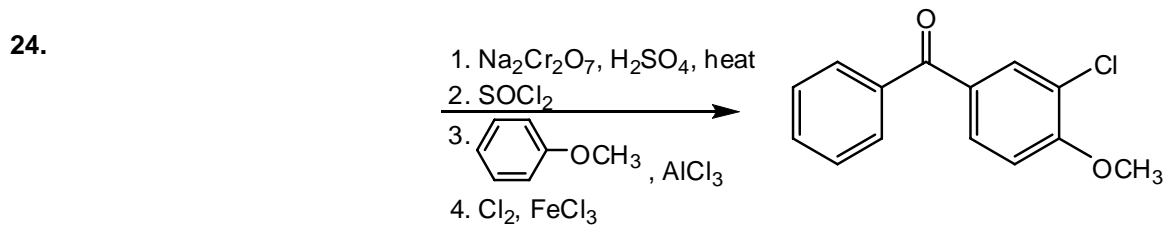
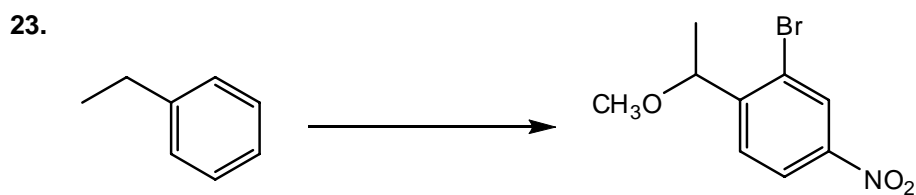
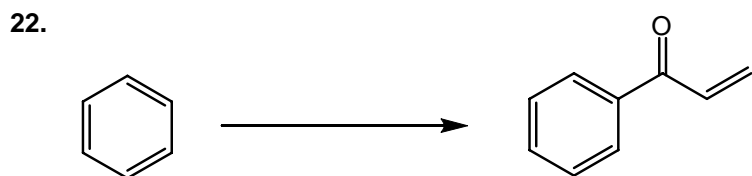
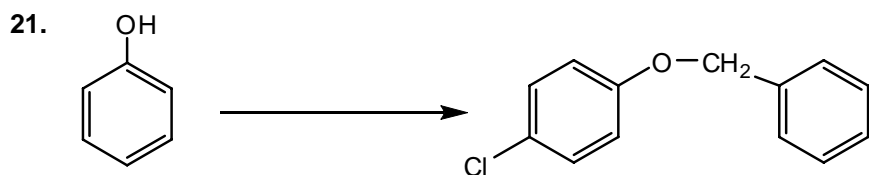
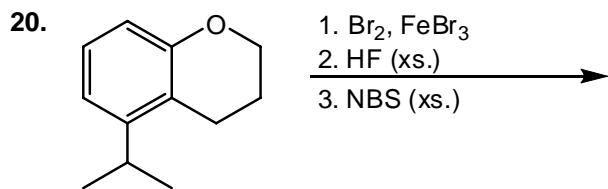
7. 
 1. CH₃CH₂Cl, AlCl₃
 2. NBS, hv
 3. NaCN, acetone

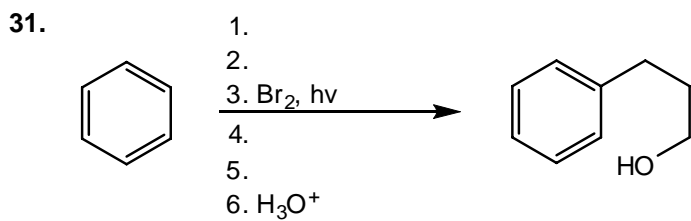
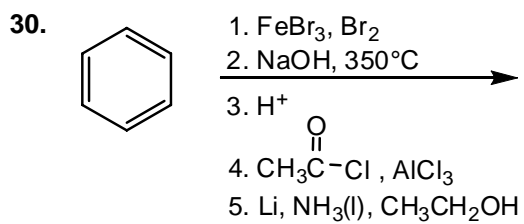
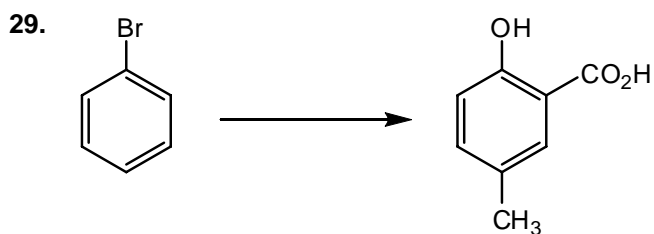
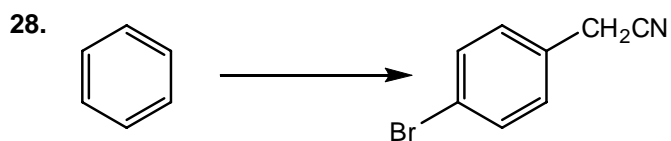
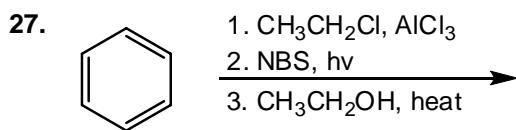
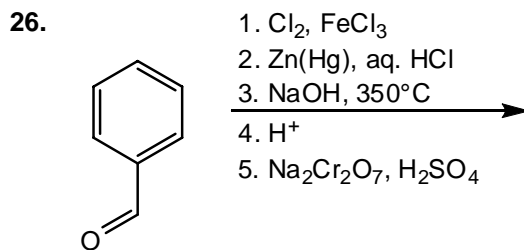
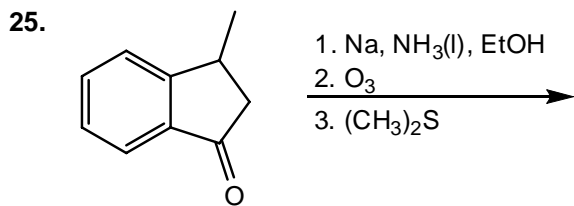
8. 
 1. Br₂, FeBr₃
 2. Mg, Et₂O
 3. 
 4. H₃O⁺

9. 
 1. Na₂Cr₂O₇, H₂SO₄, H₂O
 2. SOCl₂
 3. , AlCl₃
 4. Zn(Hg), aq. HCl

10. 
 1. CH₃CH₂C(=O)-Cl, AlCl₃
 2. HNO₃, H₂SO₄
 3. Zn(Hg), aq. HCl

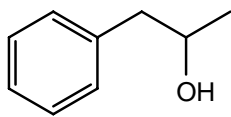




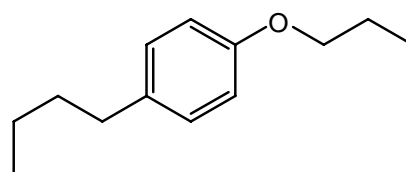


Synthesis: Synthesize the molecule below using any of the following reagents: benzene, any **stable, three carbon** molecule, any inorganic reagents, any oxidizing or reducing agents, and any peroxyacids.

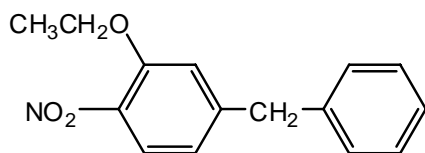
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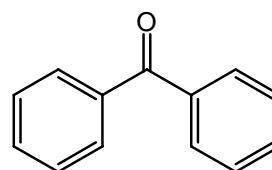
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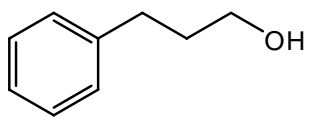
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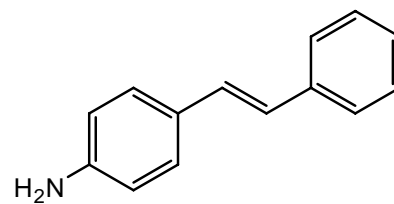
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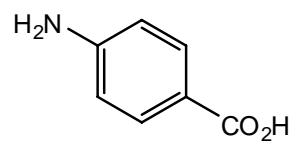
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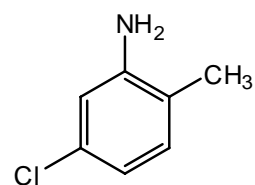
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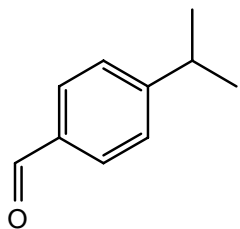
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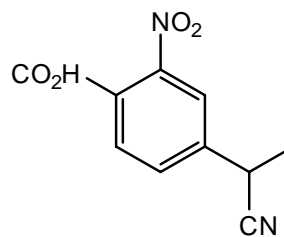
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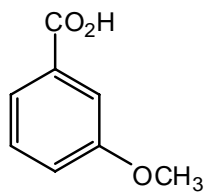
40.



41.



42.



43.

