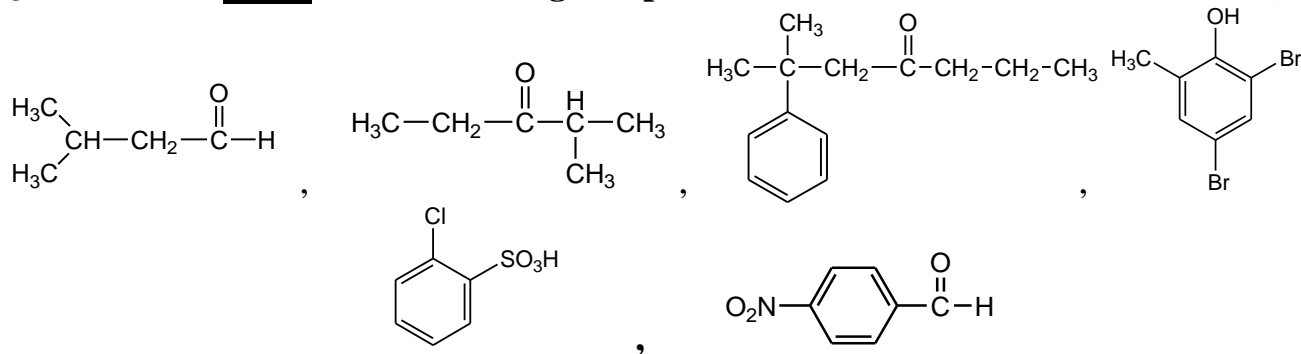




**Q. 1/ Name of Five of the following compounds: (10M)**



**Q.2/ Explain the following (Support your answer by structure and chemical equations): (20 M)**

- The low reactivity of aryl halides toward nucleophilic substitution attributed to two factors?
- Synthesis of Phenol starts with *Cumene*?
- Sandmeyer reaction?
- Reimer-Tiemann reaction?

**Q. 3/ Complete the following paragraphs: (10M)**

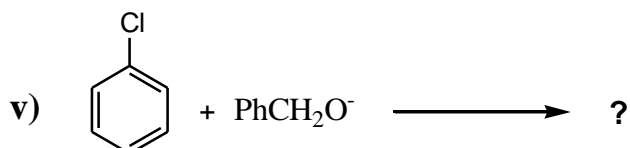
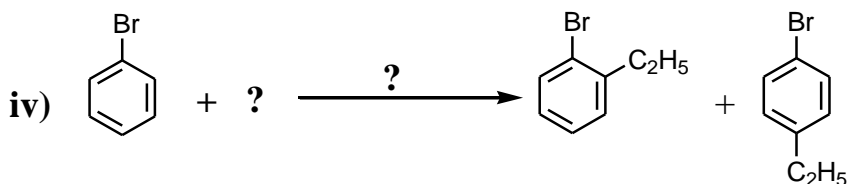
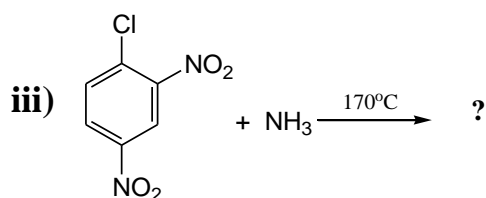
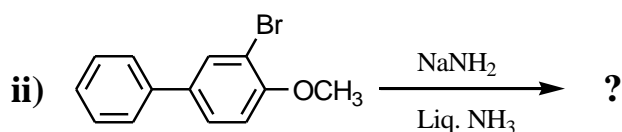
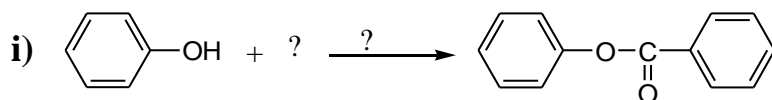
- Aryl halides are insoluble in ..... but soluble in .....
- The electron-withdrawing groups .....the acidity of Phenols, but the electron-donating groups ..... the acidity of Phenols.
- To obtain mononitrophenols, it is necessary to use ..... at .....temperature.
- The common names of aldehydes are derived from the names of the corresponding .....
- Most phenols are considerably ..... acids than carboxylic acids.

To be continued 



Q. 4/ Complete the following equations:

(10M)



**GOOD LUCK**