





**12. Student's obligation**

The role of students and their obligation throughout the academic year are the Attendance and completion of all tests, examinations, and homework's.

**13. Forms of teaching**

- white board
- hand out
- data show

**14. Assessment scheme :- there is two main exams**

1- May

Theory (15 marks)

Practical (35 marks)

2- Final exam (50marks)

Total marks : (100 %)

**15. Student learning outcome:**

The student will have the experience with the different organic molecules and the methods available in carrying out them in addition he will learn the methods of preparation and the type of reactions used to these Alkanes , Alkenes, Alkynes.....etc

**16. Course Reading List and References:**

1.General organic chemistry

2.Advanced organic chemistry

**17. The Topics:****Lecturer's name**

❖ The specifications of carbon atom

(1<sup>st</sup> week)

❖ Alkanes, specifications and their nomenclature.

(2<sup>nd</sup> week)

❖ Preparation of alkanes

(3<sup>rd</sup> week)

❖ Reactions of alkanes

(4<sup>th</sup>week)

<ul style="list-style-type: none"> <li>❖ Alkenes, specifications, activity and nomenclature.</li> <li>❖ Preparation of alkenes, Reactions of alkenes</li> <li>❖ Some important mechanisms in alkenes reactions.</li> <li>❖ Acetylenes; activity, nomenclature and specifications</li> <li>❖ Preparation of acetylene, Reactions of acetylene.</li> <li>❖ Aromatic compounds: Formula and nomenclature ,Ortho , Para, and Meta directory groups</li> <li>❖ Alcohols: Structure &amp; nomenclature</li> <li>❖ Preparation of alcohols, Reactions of alcohols.</li> <li>❖ Carboxylic acids: introduction and nomenclature</li> <li>❖ Special methods for synthesis of carboxylic acids.</li> <li>❖ Chemical reactions of carboxylic acids.</li> <li>❖ Dicarboxylic acids: formula and nomenclature</li> <li>❖ Reactions of benzene ring.</li> <li>❖ Amines: types &amp; nomenclature</li> <li>❖ Preparation &amp; Reactions of Amines</li> </ul>	(1 <sup>st</sup> week) (2 <sup>nd</sup> week) (3 <sup>rd</sup> week) (4 <sup>th</sup> week) (1 <sup>st</sup> week) (2 <sup>nd</sup> week) (3 <sup>rd</sup> week) (4 <sup>th</sup> week)
<b>18. Practical Topics (If there is any)</b>	
<ul style="list-style-type: none"> <li>➤ Method of purification</li> <li>➤ Distillation – normal distillation</li> <li>➤ Fractional distillation</li> <li>➤ Vacuum distillation</li> <li>➤ Sublimation</li> <li>➤ Recrystallization</li> <li>➤ Extraction</li> <li>➤ Soup</li> <li>➤ Aspirin synthesis</li> <li>➤ Synthesis of polymer</li> </ul>	Dr. Bakhtiar Kakel Snowber M. Ahmed  (3 hrs)

