

Hydrocarbons

| Sr | Questions | Answers Choice |
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| 1 | Which of the following shows position isomerism. | A. But-1 -ene and but -2- ene B. Ethene and ethyne C. Propane and propene D. Cyclohexane and benzene |
| 2 | Which class of hydrocarbons contains one or more double bonds. | A. Alkanes B. Aromatics C. Cycloalkanes D. Alkenes |
| 3 | Polymerization of ethene gives. | A. Polyvinyl chloride B. Polyethylene C. Polystyrene D. Teflon |
| 4 | The structure of methane contains how many sigma bonds. | A. 1 B. 3 C. 4 D. 2 |
| 5 | What is the IUPAC name of CH ₃ CH ₂ CH ₃ ? | A. Methane B. Propane C. Butane D. Ethane |
| 6 | The most stable carbonium ion among the following is. | A. (CH ₃) ₃ C ⁺ B. CH ₃ ⁺ C. CH ₃ CH ₂ ⁺ D. (CH ₃) ₂ CH ⁺ |
| 7 | What is the first step in the free radical mechanism. | A. Termination B. Propagation C. Initiation D. Elimination |
| 8 | Which compound is a cycloalkane. | A. Butene B. Cyclopentane C. Benzene D. Cyclopentane |
| 9 | Chain isomerism occurs due to differences in | A. Funtional group B. Double bond position C. Carbon chain branching D. Molecular formula |
| 10 | An alkene undergoes ozonolysis followed by reduction with zinc dust and water to yield propanone and methanal. The alkene is | A. 1- Butene B. 2- Butene C. 2- Methylpropene D. 2- Methyl -2- butene |
| 11 | Which of the followig reagent is typicly used for the acid catalyzed hdration of alkenes to form alcohols. | A. Dilute H ₂ SO ₄ B. H ₂ /Ni C. O ₃ followed by Zn/H ₂ O D. Br ₂ in CCl ₄ |
| 12 | Which of the following is most stable. | A. Tertiary radical B. Primary radical C. Secondary radical D. Methyl radical |
| 13 | The termination step in a radical chain reaction involves. | A. Chain breaking B. Light absorpition C. Chain initiation D. Hydrogen abstraction |
| 14 | Which of the following is an aromatic hydrocarbon | A. Ethene B. Benzene C. Methane D. Cyclohexane |
| 15 | Which of the following has a branched chain structure. | A. n - butane B. 2- methylpropane C. Ethane D. Propene |

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| 16 | Structuralisomers differ in | A. Only the boiling point B. Only the melting point C. Arrangement of atoms D. Number of atoms |
| 17 | What is the prefix for a three -carbon chain in IUPAC nomenclature. | A. Eth- B. Prop- C. But- D. Pent- |
| 18 | Which of these hydrocarbons is saturated | A. Propane B. Ethyne C. Butane D. Cyclopentene |
| 19 | The intermediate formed during electrophilic addition | A. Free radical B. Carbocation C. Carbene D. Carbanion |
| 20 | What is the correct IUPAC name of $\text{CH}_3\text{CH}=\text{CH}_2$? | A. Propene B. Propane C. Ethene D. Butene |