

Chp 6 Hydrocarbons + Structure

6.1 Hydrocarbons

(2) (1) (4) (4) (3) (4)
45, 48, 49, 50, 52, 54

- types

- physical properties

18

6.2 Saturated Hydrocarbons: Alkanes

(2) (4) (2) (1) (1) (1)
55, 56, 57, 59, 60, 61,

- conformations

- structural isomers

- straight-chain

- branched-chain

- cycloalkanes

(4) (4) (1) (2)
62, 63, 65, 66

25

6.3 writing structures

(6) (3) (8) (5) (3) (4)
67, 68, 69, 70, 71, 72

- condensed

- skeletal line

(4)
73

33

6.4 unsaturated hydrocarbons:enes/ynes

Alkene

- diene

- polyene

(4) (4) (2) (4) (2)
75, 76, 77, 78, 80

(3)
81

19

Geometric Isomers

- cis

- trans

Alkynes

6.5 Naming Hydrocarbons

IUPAC

prefix root suffix

Naming straight-chain

- Alkanes
- cycloalkanes
- alkenes
- Alkynes

(2) (3) (9) (3) (12)
87, 83, 84, 85, 86

(10) (4) (4) (3) (12)
87, 88, 90, 91, 93

(16) (8) (8) (10)
94, 95, 96, 97

94

Naming Branched-chain

- substituent
- finding the main chain

6.6 Aromatic Hydrocarbons

- Benzene
 - delocalized
 - resonance structures
- Naming substituted benzenes

(3) (1) (4) (4) (2)
98, 99, 101, 102, 103

(5) (6) (2) (2)
104, 105, 106, 107

(8)
109

37

Chemistry in Medicine

(2) (1) (2) (7) (1)
115, 116, 117, 118, 119

(1) (1) (2) (1)
120, 121, 122, 123

(2)
124

20