

Cis-Trans Isomers

Name - _____

1.) Draw the actual shape of the following molecules using condensed structures.

(a) trans-2-hexene

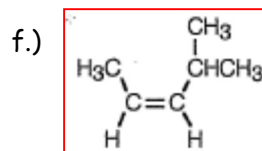
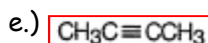
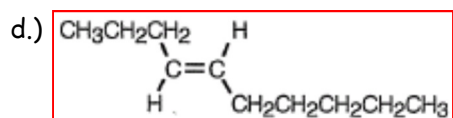
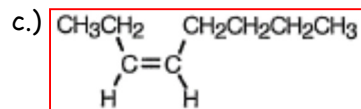
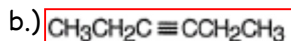
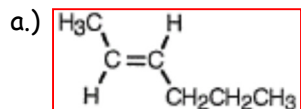
(a) cis-3-octene

(e) 2-butyne

(b) 3-hexyne

(d) trans-4-decene

(f) 4-methyl-cis-2-pentene



2.) Which of the following molecules can exhibit cis-trans isomerism? (hint - draw them!)

(a) 1-butene

(c) 4-heptyne

(e) 3-ethyl-3-hexene

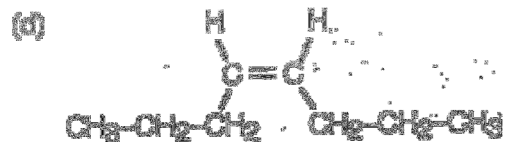
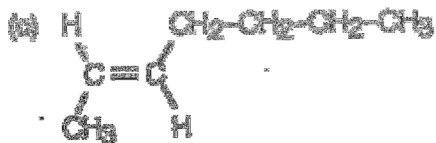
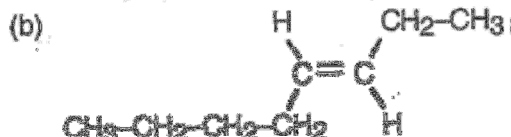
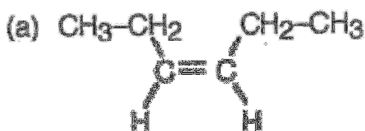
(b) 3-hexene

(d) 2-octene

(f) 2,5-dimethyloctane

a.) nob.) yesc.) nod.) yese.) nof.) no

3.) Name the following as "cis" or "trans" isomers.

a.) cisb.) transc.) transd.) cis