Problems for Chapter 25

Write a **complete structural formula** of the organic polymer that is produced in each of the following reactions. Also, in each case, state whether the polymerization process is addition, condensation, or ring-opening.

\[ \text{HO-CO-COOH + HO-CH}_2\text{CH}_2\text{-OH} \rightarrow \text{polymer} \]

\[ \text{C}_3\text{H}_6\text{O} \rightarrow \text{polymer} \]

\[ \text{CH}_2=\text{CH} \rightarrow \text{polymer} \]

\[ \text{HO-CO-COOH + HO-CH}_2\text{CH}_2\text{-OH} \rightarrow \text{polymer} \]