1. Convert. Show your work using a tape diagram or an equation. The first one is done for you.

a. \( \frac{1}{2} \) yard = \( \frac{1}{2} \) feet

\[
\frac{1}{2} \text{ yard} = \frac{1}{2} \times 1 \text{ yard} \\
= \frac{1}{2} \times 3 \text{ feet} \\
= \frac{3}{2} \text{ feet} \\
= 1\frac{1}{2} \text{ feet}
\]

b. \( \frac{1}{3} \) foot = \( \frac{4}{4} \) inches

\[
\frac{1}{3} \text{ foot} = \frac{1}{3} \times 1 \text{ foot} \\
= \frac{1}{3} \times 12 \text{ inches} \\
= 4 \text{ inches}
\]

c. \( \frac{5}{6} \) year = \( 10 \) months

\[
\frac{5}{6} \text{ yr} = \frac{5}{6} \times 12 \text{ months} \\
= 10 \text{ months}
\]

d. \( \frac{4}{5} \) meter = \( 80 \) centimeters

\[
\frac{4}{5} \text{ m} = \frac{4}{5} \times 100 \text{ cm} \\
= 80 \text{ cm}
\]

e. \( \frac{2}{3} \) hour = \( 40 \) minutes

\[
1 \text{ hr.} = 60 \text{ min.} \\
\frac{2}{3} \text{ hr} = \frac{2}{3} \times 60 \\
= 40 \text{ min.}
\]

f. \( \frac{3}{4} \) yard = \( 27 \) inches

\[
\frac{3}{4} \text{ yd} = \frac{3}{4} \times 36 \text{ inches} \\
= 27 \text{ inches}
\]
2. Mrs. Lang told her class that the class’s pet hamster is \(\frac{1}{4}\) ft in length. How long is the hamster in inches?

\[
\frac{1}{4}\text{ ft.}\ = \frac{3}{4}\text{ inches} \quad \frac{1}{4}\text{ ft.} \times 12\text{ inches} = \frac{12\times 3}{4\times 1} = 3\text{ inches}
\]

3. At the market, Mr. Paul bought \(\frac{7}{8}\) lb of cashews and \(\frac{3}{4}\) lb of walnuts.
   a. How many ounces of cashews did Mr. Paul buy?

\[
\frac{7}{8}\text{ lb} = 14\text{ ounces} \quad \frac{7}{8} \times 16 = 14\text{ oz}
\]

b. How many ounces of walnuts did Mr. Paul buy?

\[
\frac{3}{4}\text{ lb} = 12\text{ ounces} \quad \frac{3}{4} \times 16 = 12\text{ oz}
\]

c. How many more ounces of cashews than walnuts did Mr. Paul buy?

He bought 2 more oz of cashews than walnuts.

d. If Mrs. Toombs bought \(1\frac{1}{2}\) pounds of pistachios, who bought more nuts, Mr. Paul or Mrs. Toombs?

\[
\frac{3}{4} = 24\text{ oz} \quad \frac{1}{6} = 26\text{ oz}
\]

4. A jewelry maker purchased 20 inches of gold chain. She used \(\frac{5}{8}\) of the chain for a bracelet. How many inches of gold chain did she have left?

\[
\frac{5}{8} \text{ of } 20 = \frac{5 \times 20}{84} = \frac{50}{4} = 12\frac{2}{4} = 12\frac{1}{2}
\]

There are 12\(\frac{1}{2}\) in of gold chain left.