

Name Key  
Mrs. Roubos

Date \_\_\_\_\_  
8R Period \_\_\_\_\_

Estimating Square Roots  
Homework Day 2  
\*\*Show work\*\*

Approximate each square root to the nearest tenth

1)  $\sqrt{13}$

$$\sqrt{9} < \sqrt{13} < \sqrt{16}$$

$$3 < \sqrt{13} < 4$$

$$\begin{array}{r} 13 \\ -9 \\ \hline 4 \end{array} \quad \begin{array}{r} 16 \\ -13 \\ \hline 3 \end{array}$$

$\sqrt{13}$  is between 3 and 4 and closer to  
4

$$\sqrt{13} = 3.605551275\dots = \boxed{3.6}$$

Approximate each square root to the nearest hundredth

2)  $\sqrt{40}$

$$\sqrt{36} < \sqrt{40} < \sqrt{49}$$

$$6 < \sqrt{40} < 7$$

$$\begin{array}{r} 40 \\ -36 \\ \hline 4 \end{array} \quad \begin{array}{r} 49 \\ -40 \\ \hline 9 \end{array}$$

$\sqrt{40}$  is between 6 and 7 and  
closer to 6

$$\sqrt{40} = 6.32455532\dots = \boxed{6.32}$$