Section 2.4

Solving Right Triangles

SIGNIFICANT DIGITS

Use the principle of significant digits to perform the following calculations. Each number shown properly adheres to the principle of significant digits, and your answer should be rounded correctly to adhere to the principle of significant digits.

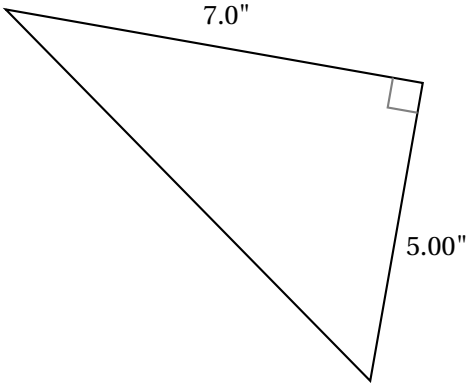
(i) $\sin\left(52.3°\right)$

(ii) The circumference of a circle is $C = 2\pi \cdot r$, where r is the radius. Find the circumference of a circle with a measured radius of $r = 1.20$ cm.

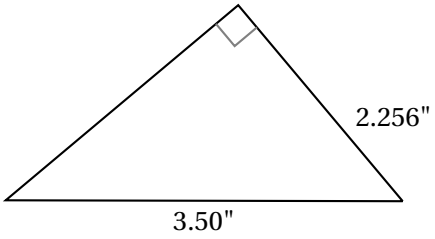
(iii) How many digits of π were necessary in (ii)? Did the 2 in the formula impact how many significant digits you use?

Solving Right Triangles

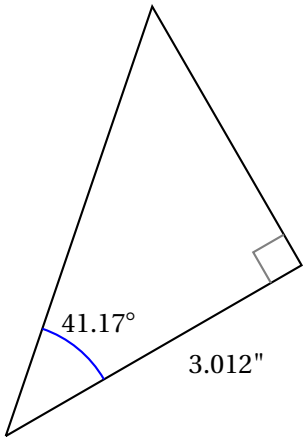
1. Solve a right triangle when you are given two side lengths:



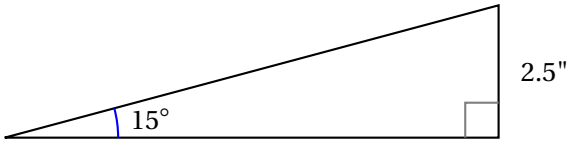
2. Solve a right triangle when given two side lengths:



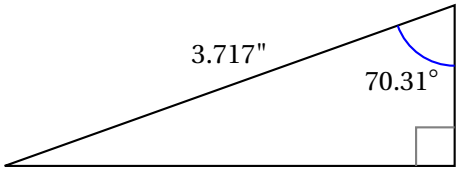
3. Solve a right triangle when given an angle and an adjacent side:



4. Solve a right triangle when given an angle and an opposite side:



5. Solve a right triangle given an angle and the hypotenuse:



6. Find the missing side length *s*: