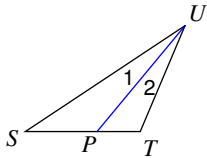


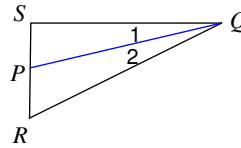
Angle Bisectors of Triangles

Each figure shows a triangle with one of its angle bisectors.

1) $m\angle SUT = 34^\circ$. Find $m\angle 1$.

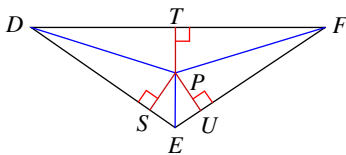


2) Find $m\angle SQR$ if $m\angle 2 = 13^\circ$.

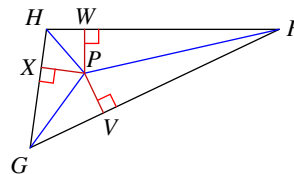


Each figure shows a triangle with its three angle bisectors intersecting at point P.

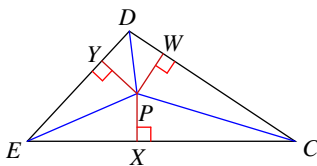
3) $PT = 3$. Find PU .



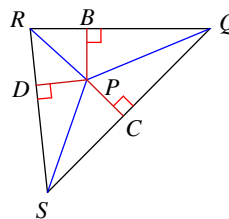
4) Find PV if $PW = 7$.



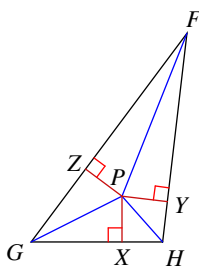
5) Find PW if $PX = 5$.



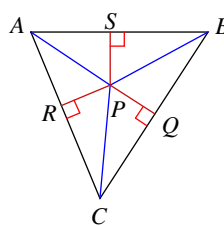
6) Find PD if $PC = 8$.



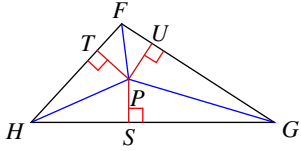
7) $PY = 2$ and $HP = 3$.
Find HY .



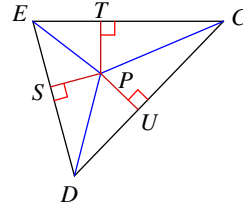
8) Find AP if $PQ = 1$
and $AR = 2$.



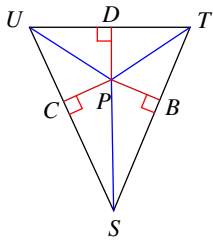
- 9) $PT = 5$ and $FP = 7$.
Find FT .



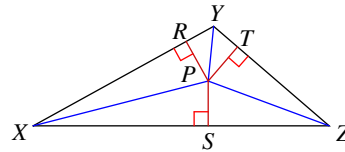
- 10) $PT = 3$ and $CP = 8$.
Find CT .



- 11) Find PB if $UC = 2$
and $UP = 3$.

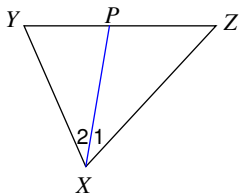


- 12) $PS = 3$ and $XP = 5$.
Find XS .

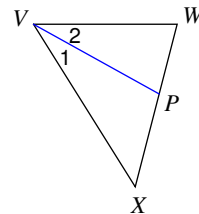


Each figure shows a triangle with one of its angle bisectors.

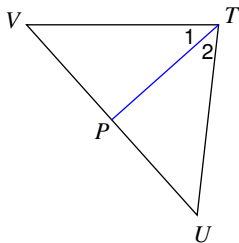
- 13) Find x if $m\angle 2 = 4x + 5$ and
 $m\angle 1 = 5x - 2$.



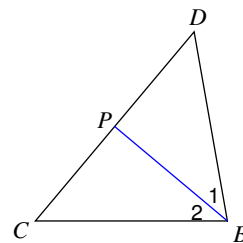
- 14) Find x if $m\angle 2 = 1 + 28x$ and
 $m\angle XVW = 59x - 1$.



- 15) $m\angle 1 = 7x + 7$ and $m\angle VTU = 16x + 4$.
Find $m\angle 1$.



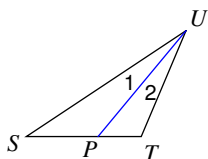
- 16) Find $m\angle 2$ if $m\angle 2 = 7x + 5$ and
 $m\angle 1 = 9x - 5$.



Angle Bisectors of Triangles

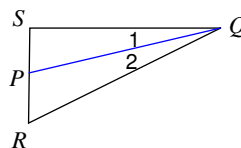
Each figure shows a triangle with one of its angle bisectors.

1) $m\angle SUT = 34^\circ$. Find $m\angle 1$.



17°

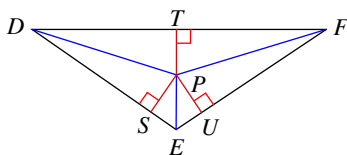
2) Find $m\angle SQR$ if $m\angle 2 = 13^\circ$.



26°

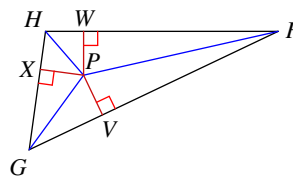
Each figure shows a triangle with its three angle bisectors intersecting at point P.

3) $PT = 3$. Find PU .



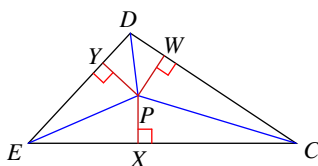
3

4) Find PV if $PW = 7$.



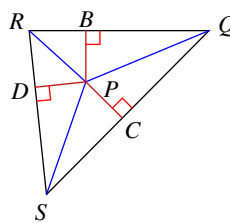
7

5) Find PW if $PX = 5$.



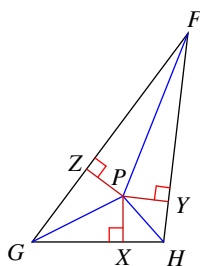
5

6) Find PD if $PC = 8$.



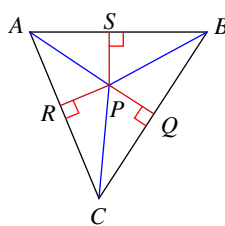
8

7) $PY = 2$ and $HP = 3$.
Find HY .



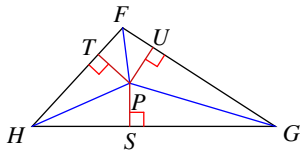
2.24

8) Find AP if $PQ = 1$
and $AR = 2$.



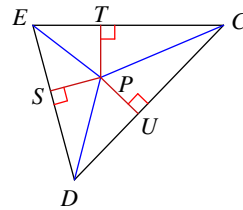
2.24

- 9) $PT = 5$ and $FP = 7$.
Find FT .



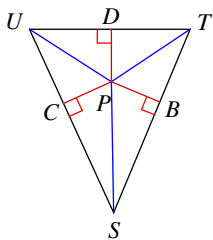
4.9

- 10) $PT = 3$ and $CP = 8$.
Find CT .



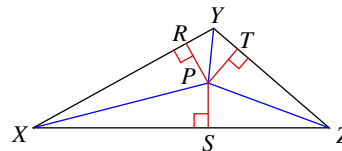
7.42

- 11) Find PB if $UC = 2$
and $UP = 3$.



2.24

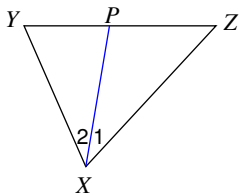
- 12) $PS = 3$ and $XP = 5$.
Find XS .



4

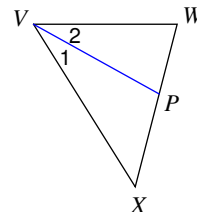
Each figure shows a triangle with one of its angle bisectors.

- 13) Find x if $m\angle 2 = 4x + 5$ and
 $m\angle 1 = 5x - 2$.



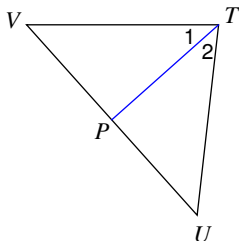
7

- 14) Find x if $m\angle 2 = 1 + 28x$ and
 $m\angle XVW = 59x - 1$.



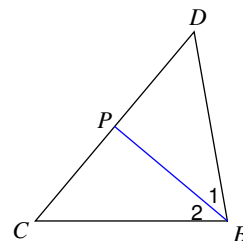
1

- 15) $m\angle 1 = 7x + 7$ and $m\angle VTU = 16x + 4$.
Find $m\angle 1$.



42°

- 16) Find $m\angle 2$ if $m\angle 2 = 7x + 5$ and
 $m\angle 1 = 9x - 5$.



40°