



مدارس الكلية العلمية الإسلامية  
Islamic Educational College  
Jubeiha - Jabal Amman



# Unit: Geometry

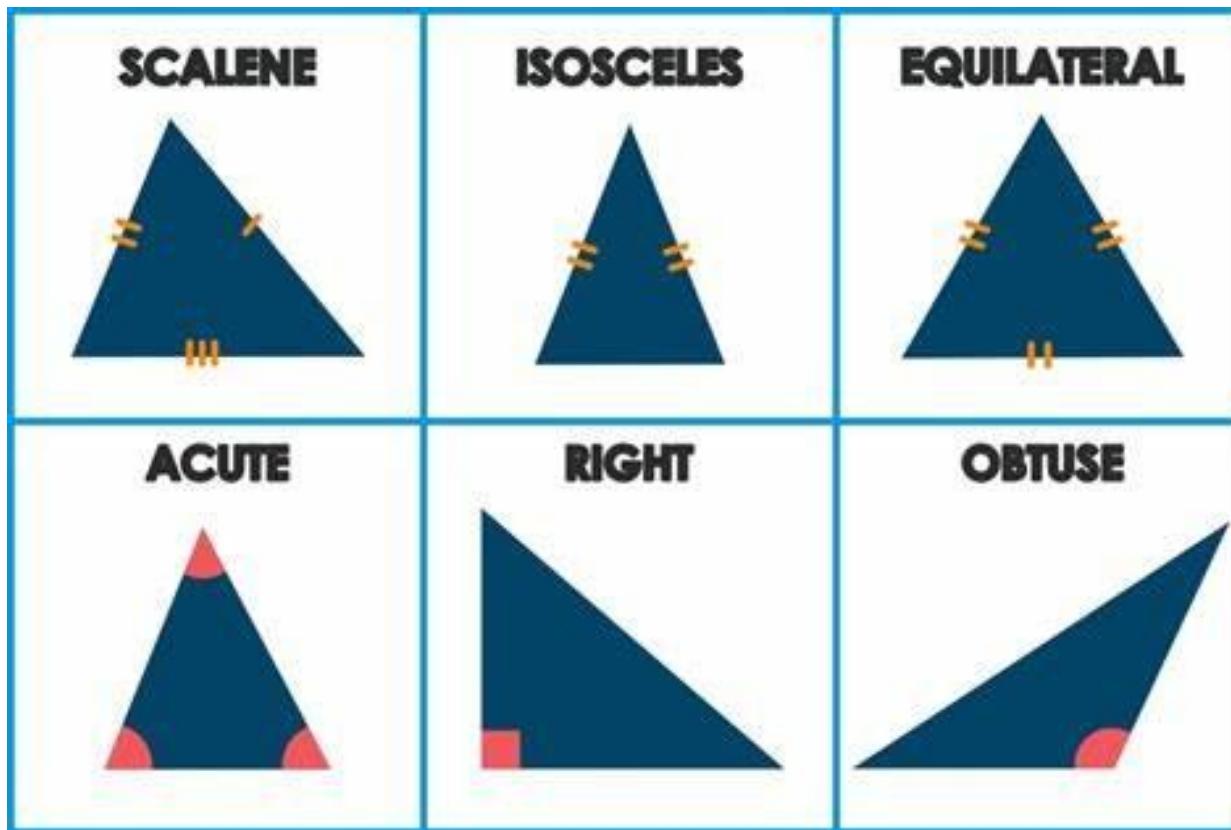
## Lesson: Types of Triangle

### Grade: Ten



## Objectives:

- Calculate the sum of angles of a triangle.





SUBJECT: Math

GRADE: 6

UNIT: 3

Lesson: 1

# What is an angle?



Google



## **What is an angle?**

An angle is a figure formed by two rays that have the same endpoint.



Obtuse

Right

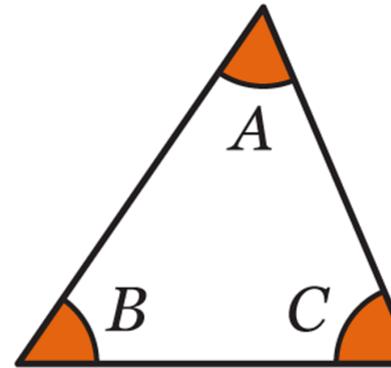
Reflex

Acute

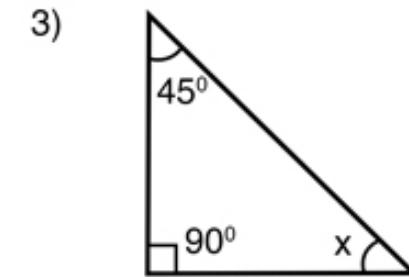
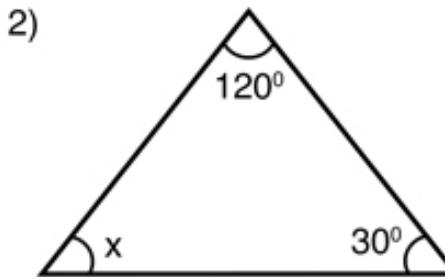
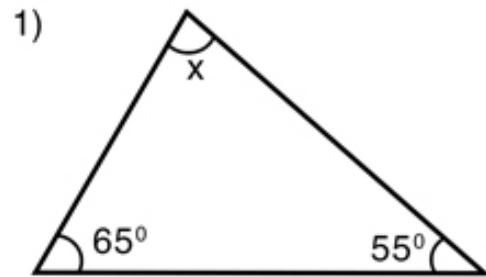
Straight



### Interior angles in a triangle



$$A + B + C = 180^\circ$$

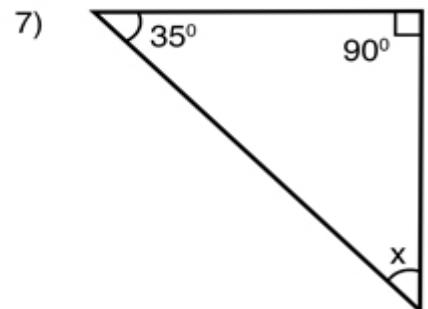
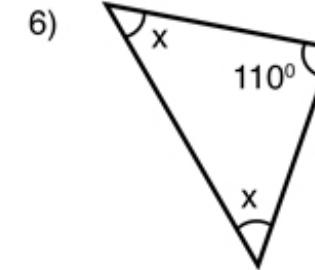
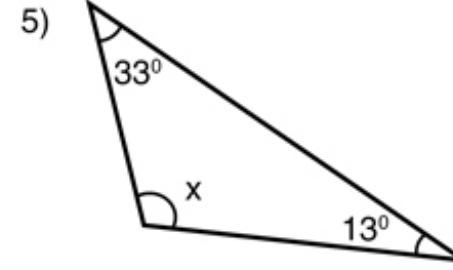
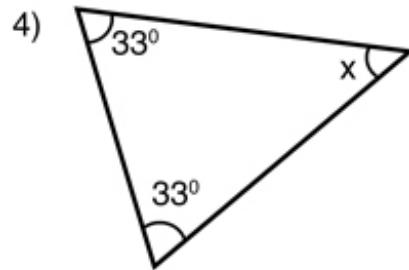


$$x = \text{_____}$$

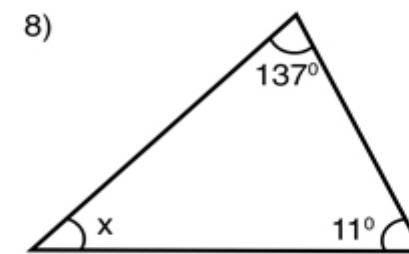
$$x = \text{_____}$$

$$x = \text{_____}$$





$$x = \text{_____}$$

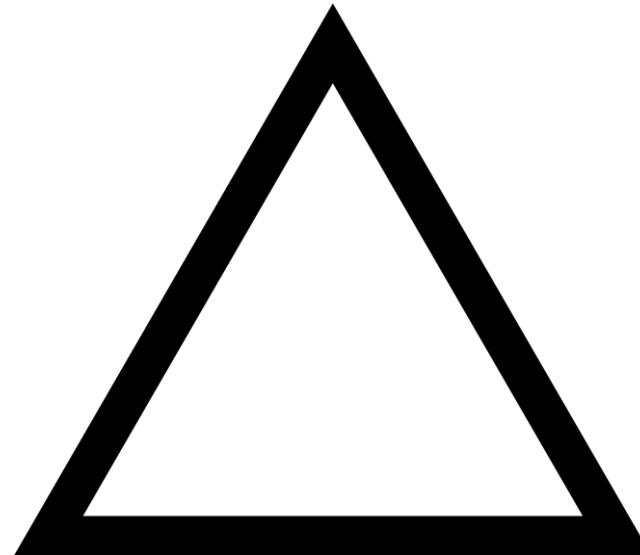


$$x = \text{_____}$$





A triangle has angles in the ratio 2:3:4.  
Find the measure of each angle.





1

In a triangle, two angles measure  $55^\circ$  and  $75^\circ$ .

2

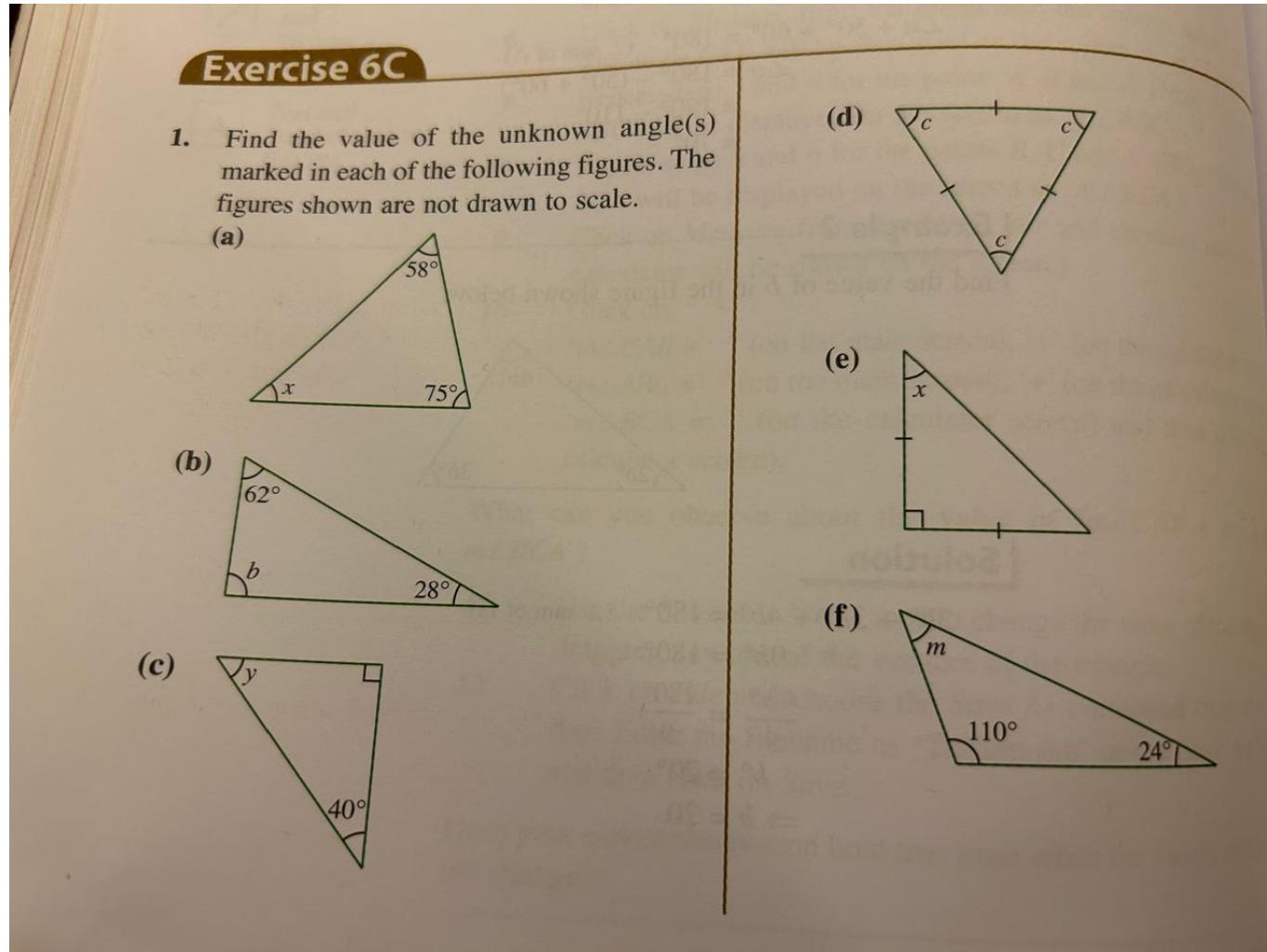
The three angles of a triangle are  $x$ ,  $x + 20^\circ$ , and  $40^\circ$ .  
Find the value of  $x$ .

3

In a triangle, one angle is **three times** another angle, and the third angle is  **$20^\circ$  more** than the smallest angle.  
Find the angles.

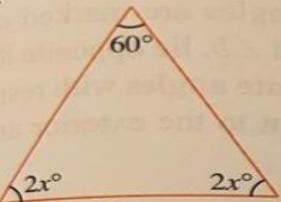
4

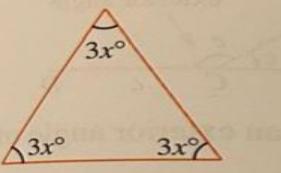
A triangle has angles  $3x + 10^\circ$ ,  $x - 5^\circ$ , and  $2x$ .  
Find all the angles.



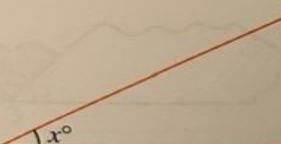


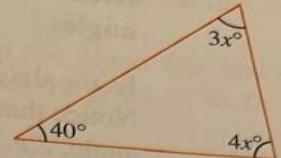
1. Find the value of  $x$  in each of the following figures. The figures shown are not drawn to scale.

(a) 

(b) 

(c) 

(d) 

(e) 

3.  $PQR$  is an isosceles triangle in which  $PQ = PR$  and  $\angle QPR = 48^\circ$ .  $PS$  is parallel to  $QR$  and  $TPR$  is a straight line. Calculate  
 (a)  $\angle QRP$ ,  
 (b)  $\angle TPS$ .

