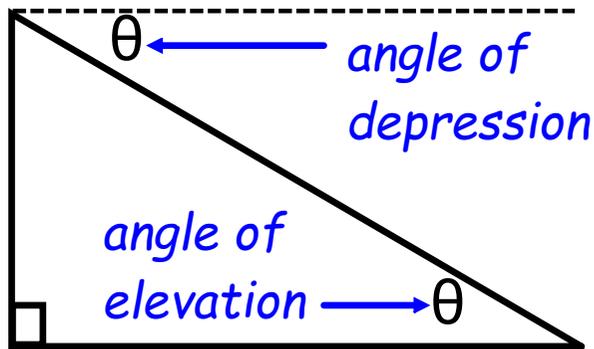


PreCalculus - Triangle Trig

Right Triangle Apps:



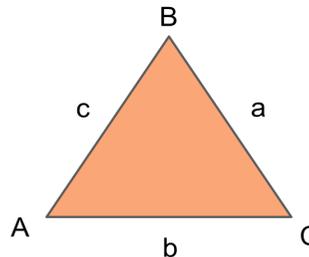
Area of a Triangle:

$$Area = \frac{1}{2}bc\sin A$$

$$Area = \sqrt{s(s-a)(s-b)(s-c)}$$

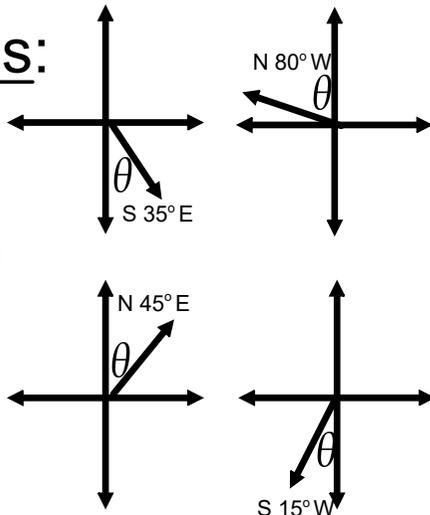
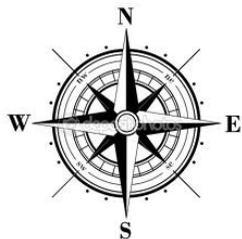
$$s = \frac{a+b+c}{2}$$

Law of Cosines (SAS or SSS):



- $a^2 = b^2 + c^2 - 2bc\cos A$
- $b^2 = a^2 + c^2 - 2ac\cos B$
- $c^2 = a^2 + b^2 - 2ab\cos C$

Bearings:



Law of Sines (ASA, AAS or SSA!!):

$$\frac{a}{\sin A} = \frac{b}{\sin B} = \frac{c}{\sin C}$$

↑
Don't forget
about the
ambiguous
case!