Name:
Mailbox \#:

Use the given diagram to express each ratio in simplest form.

1) $A B: A C$
2) $B C$ to $A C$
3) $B C$
$A B$
4) $m<C$
$m<A$
5) $m<B: m<C$

Express the ratio of $A B: A D$ in simplest form.
6) $A B=5 m$
$A D=2 m$
7) $A B=8 \mathrm{~cm}$
$A D=8 m$

Find the measure of each angle for \#8 and 9.
8) Two complementary angles have measures in the ratio $2: 3$
9) The measures of the angles of a triangle are in the ratio $3: 4: 5$.
10) The perimeter of a triangle is 48 cm and the lengths of the sides are in ratio $2: 2: 5$. Find the length of each side.
11) The ratio of the measures of the exterior angles of a pentagon is $2: 3: 4: 4: 5$. Find the measure of each exterior angle.
12) Using the answer from \#11 find the measure of the largest interior angle.

