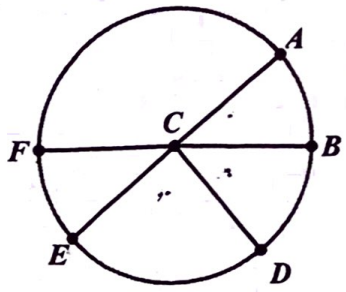
P.6

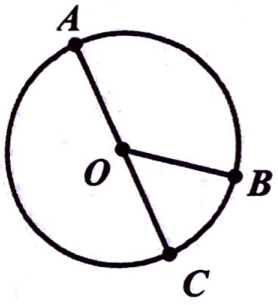
Math 3: Unit 6a Circles WARMUP — Arcs and Angles Practice

In circle C, $\overline{EA}$ and $\overline{FB}$ are diameters. $\overline{EA} \perp \overline{CD}$. Identify the following.



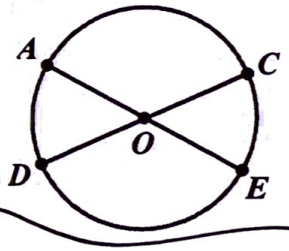
a) Two major arcs $\overset{\frown}{AED}$ $\overset{\frown}{FAD}$
b) Two minor arcs $\overset{\frown}{DB}$ $\overset{\frown}{AB}$
c) Two semicircles $\overset{\frown}{EFA}$ $\overset{\frown}{ADE}$
d) A pair of adjacent angles $\angle FCE$ and $\angle ECD$
e) An acute central angle $\angle FCE$
f) An obtuse central angle $\angle FCA$

Identify the following in Circle *O*.



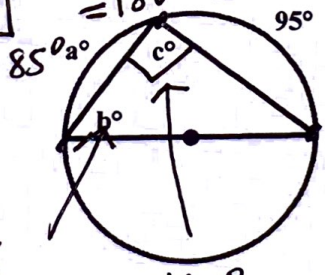
a) $\overline{AC}$ diameter
b) $\overset{\frown}{AB}$ minor arc
c) $\overset{\frown}{ABC}$ semicircle
d) $\overset{\frown}{ACB}$ major arc
e) $\overline{OB}$ radius
f) $\angle BOC$ central angle
↑ vertex at center

Identify the following in Circle *O*.



a) The minor arcs $\overset{\frown}{CE}$ $\overset{\frown}{AD}$
b) The semicircles $\overset{\frown}{DEC}$
c) The major arcs that contain point A $\overset{\frown}{AEC}$

Find the value of each variable. P.6



a = 85°
b = 47.5°
c = 90°

$=180-95$

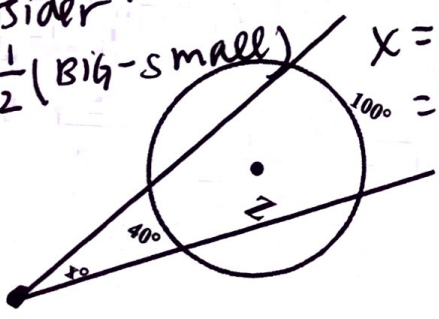
$b = \frac{95}{2}$

180°

Find the value of each variable.

'outsider'

$x = \frac{1}{2}(BIG - small)$



$x = \frac{1}{2}(100-40)$

$100° = \frac{1}{2}(60)$

$= 30$

x = 30°

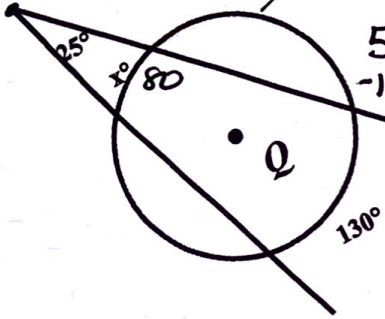
$angle = \frac{1}{2}(BIG - small)$

$2 \cdot 25 = \frac{1}{2}(130 - x)$

$50 = 130 - x$

$-130 \quad -130$

$-80 = -x$



x = 80°