# Jesse Humberd Scholarship 

Turn into Dr. Johnson by 3/15/2020

## Problem 4: Robots Grabbing Circles

A robot grabs a circle by touching it in three places. The robots knows the position of these three places, call them

$$
(a, b),(c, d), \text { and }(x, y)
$$

where $a, b, c, d, x$, and $y$ are real numbers. Help the robot find the coordinates of the center of the circle.

