



Problem Statement

Two convergent spheres are divided by a trilateral bisector normal to their tangent diameters. A line connecting their centers describes an angle equal in degrees to half their combined radii in millimeters. A line drawn tangent to their outer diameters intersects a line drawn through their centers at the distance from the smaller sphere's center equal to the average of both sphere's circumference. Both spheres are made of 1040 mild steel and have a wall thickness of $1/10$ th their diameter. If both spheres are released at the same time in a fluid with a specific gravity of 1.79 what color is the blue one?