WEEK: _____   **PROBLEM:** _____
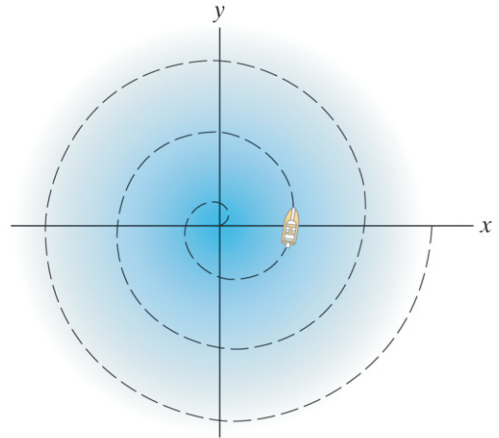
GIVEN:

A boat searching for underwater archaeological sites in the Aegean Sea moves at 4 knots and follows the path $r = 10\theta$ m, where θ is in radians. (A knot is one nautical mile, or 1852 meters, per hour.) When $\theta = 2\pi$ rad, determine the boat's velocity (a) in terms of polar coordinates and (b) in terms of cartesian coordinates.

REQUIRED:

SOLUTION: