8   The equation of a curve is $y = \sqrt{(8x - x^2)}$. Find

   (i) an expression for $\dfrac{\mathrm{d}y}{\mathrm{d}x}$, and the coordinates of the stationary point on the curve,   [4]

   (ii) the volume obtained when the region bounded by the curve and the x-axis is rotated through $360°$ about the x-axis.   [4]