$\begin{array}{c} \mathbf{Quiz} \ \mathbf{4} \\ \mathrm{Math} \ 102, \ \mathrm{Term} \ 162 \end{array}$

NAME: ID:

Problem 1. Find the area of the surface generated by revolving the curve $y = 2\sqrt{x}$, $1 \le x \le 2$, about the *x*-axis.

Problem 2. Find the arc length of $y = \frac{1}{3}\sqrt{x}(x-3), 1 \le x \le 4$