For a 95% CI for the mean, from a large sample, we have taken $\bar{x} \pm z_{0.025} s/\sqrt{n}$.

Instead we can take an interval $(\bar{x} - z_{0.01} s/\sqrt{n}, \bar{x} + z_{0.04} s/\sqrt{n})$

1. Show that the second interval is indeed a 95% CI.
2. Which interval would you prefer, and why?