Name _____

Solving Fractions With Exponents

Simplify the fractions and answer in the lowest term.

1) $\left(\frac{4}{6}\right)^3 = \frac{8}{216}$

2) $\left(\frac{7}{14}\right)^5 = \frac{1}{32}$

3) $\left(\frac{10}{15}\right)^2 = \frac{4}{9}$

4) $\left(\frac{15}{25}\right)^5 = \frac{243}{3125}$

5) $\left(\frac{14}{18}\right)^3 = \frac{343}{729}$

6) $\left(\frac{4}{14}\right)^4 = \frac{256}{2401}$

7) $\left(\frac{15}{27}\right)^2 = \frac{25}{81}$

8) $\left(\frac{13}{39}\right)^4 = \frac{1}{81}$

9) $\left(\frac{12}{30}\right)^2 = \frac{4}{25}$

10) $\left(\frac{5}{25}\right)^4 = \frac{1}{625}$

11) $\left(\frac{3}{27}\right)^3 = \frac{1}{729}$

12) $\left(\frac{5}{25}\right)^3 = \frac{1}{125}$

13) $\left(\frac{14}{30}\right)^2 = \frac{49}{225}$

14) $\left(\frac{5}{40}\right)^3 = \frac{1}{512}$

15) $\left(\frac{25}{35}\right)^3 = \frac{125}{343}$

16) $\left(\frac{14}{20}\right)^2 = \frac{49}{100}$