



Math worksheet on 'Exponents - Fractional Base (Level 2)'. Part of a broader unit on 'Exponents - Negative and Fractional Bases and Exponents'

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1 Find the answer when this fraction is raised to its exponent

$$\left(\frac{7}{4}\right)^2$$

a	b	c
7	$\frac{2,401}{256}$	$\frac{9}{64}$
d	e	f
$\frac{7}{13}$	$\frac{9}{8}$	$\frac{49}{16}$

2 Find the answer when this fraction is raised to its exponent

$$\left(\frac{8}{4}\right)^2$$

a	b	c
$\frac{10}{19}$	$\frac{1}{64}$	$\frac{8}{8}$
d	e	f
$\frac{64}{16}$	$\frac{512}{8}$	$\frac{16}{256}$

3 Find the answer when this fraction is raised to its exponent

$$\left(\frac{4}{2}\right)^3$$

a	b	c
$\frac{16}{6}$	$\frac{12}{16}$	$\frac{256}{4}$
d	e	f
$\frac{12}{2}$	$\frac{256}{6}$	$\frac{64}{8}$

4 Find the answer when this fraction is raised to its exponent

$$\left(\frac{4}{3}\right)^3$$

a	b	c
$\frac{16}{24}$	$\frac{256}{9}$	$\frac{16}{9}$
d	e	f
$\frac{1,024}{3}$	$\frac{12}{3}$	$\frac{64}{27}$

5 Find the answer when this fraction is raised to its exponent

$$\left(\frac{7}{5}\right)^2$$

a	b	c
$\frac{52}{10}$	$\frac{2,401}{125}$	$\frac{7}{125}$
d	e	f
$\frac{49}{25}$	$\frac{46}{10}$	14

6 Find the answer when this fraction is raised to its exponent

$$\left(\frac{7}{3}\right)^2$$

a	b	c
$\frac{14}{3}$	$\frac{2,401}{3}$	$\frac{2,401}{3}$
d	e	f
$\frac{46}{27}$	343	$\frac{49}{9}$

7 Find the answer when this fraction is raised to its exponent

$$\left(\frac{8}{3}\right)^2$$

a	b	c
$\frac{512}{6}$	$\frac{16}{6}$	$\frac{1}{6}$
d	e	f
$\frac{64}{9}$	$\frac{16}{27}$	$\frac{10}{12}$