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Math worksheet on *'Exponents - Fractional Base (Level 3)'*. 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

$$\left(\frac{11}{8}\right)^2$$

a	b	c
$\frac{1,331}{10}$	$\frac{11}{512}$	$\frac{121}{64}$
d	**e**	**f**
$\frac{22}{16}$	$\frac{118}{512}$	$\frac{1,331}{61}$

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

$$\left(\frac{10}{8}\right)^2$$

a	b	c
$\frac{20}{16}$	$\frac{100}{64}$	$\frac{12}{4,096}$
d	**e**	**f**
$\frac{1,000}{67}$	$\frac{1,000}{8}$	$\frac{20}{512}$

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

$$\left(\frac{11}{9}\right)^2$$

a	b	c
$\frac{121}{81}$	$\frac{22}{6,561}$	$\frac{22}{18}$
d	**e**	**f**
$\frac{22}{9}$	$\frac{13}{6,561}$	$\frac{11}{11}$

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

$$\left(\frac{11}{4}\right)^2$$

a	b	c
$\frac{13}{8}$	$\frac{118}{19}$	$\frac{13}{64}$
d	**e**	**f**
$1,331$	$\frac{121}{16}$	1

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

$$\left(\frac{11}{3}\right)^2$$

a	b	c
$\frac{22}{3}$	$\frac{124}{27}$	$\frac{121}{9}$
d	**e**	**f**
11	$\frac{1,331}{3}$	$\frac{1,331}{6}$

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

$$\left(\frac{5}{11}\right)^2$$

a	b	c
10	$\frac{5}{22}$	$\frac{25}{121}$
d	**e**	**f**
$\frac{125}{14,641}$	$\frac{10}{13}$	$\frac{1}{1,331}$

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

$$\left(\frac{2}{5}\right)^3$$

a	b	c
$\frac{4}{625}$	$\frac{8}{125}$	$\frac{2}{15}$
d	**e**	**f**
$\frac{16}{15}$	$\frac{16}{625}$	$\frac{5}{625}$