Potenzen: Potenzgesetze

Zusammenfassen	Zerlegen
$k^3\cdot k^5\cdot m^4\cdot m^2$	k^{2n+3}
$z^{2+m}\cdot z^{n-1}=z^{1+m+n}$	$z^{3k+4n+m}=z^{3k}\cdot z^{4n}\cdot z^m$
$\frac{x^4-x^6}{x^2}$	$\frac{x^n}{x^{n-3}}$
$k^7\cdot k^2\cdot m^3\cdot m^6=k^9\cdot m^9=(k\cdot m)^9$	$k^{3+4n}=k^3\cdot k^{4n}$
$z^{n-3}\cdot z^{m+5}$	$z^{k+3n+2m}$
$\frac{x^6-x^9}{x^3}=x^3-x^6$	$\frac{x^3}{x^{3-n}}=x^n$
$(-m)^3\cdot(-n)^3$	$((-m)\cdot n)^4$
$q^3\cdot p^{m+5}\cdot q^{m+2}=(p\cdot q)^{m+5}$	$\frac{(p\cdot q)^m}{p}=p^{m-1}\cdot q^m$
$k^n\cdot m^n$	$(k\,m)^4$
$(-m)^5\cdot n^5=(-m\,n)^5$	$(m\cdot(-n))^2=m^2\cdot(-n)^2$
$p^2\cdot p^{m+2}\cdot q^{m+4}$	$\frac{(p\cdot q)^{m+1}}{p}$
$\left(k^3\cdot h^{n+3}\right)^4=(k\cdot h)^{12}\cdot h^{4n}$	$k^{n\cdot(m-3)}=\left(k^n\right)^m\div\left(k^n\right)^3$
$\left(k^2\cdot h^2\right)^3$	$k^{2\cdot(n+1)}$
$\left(m^6\right)^5=m^{30}$	$m^{7n}=\left(m^n\right)^7\left(m^7\right)^n$
$\left(k^{2+n}\cdot h^2\right)^2$	$k^{5\cdot(m-n)}$
$k^7\cdot m^7=(k\cdot m)^7$	$(k\cdot m)^n=k^n\cdot m^n$
$\left(m^3\right)^2$	m^{4n}
$\left(k^3\cdot h^3\right)^4=(k\cdot h)^{12}$	$k^{3(n+2)}=\left(k^3\right)^n\cdot k^6$
$\frac{x^n}{x^{m+1}}$	x^{m+n-2}
$\left(\frac{n^2}{m^3}\right)^4=\frac{n^8}{m^{12}}$	$\frac{n^{5p}}{m^{q\cdot p}}=\left(\frac{n^5}{m^q}\right)^p$
$\left(\frac{x^4}{x^{-2}}\right)^3$	$x^{2(n-m)}$
$\left(\frac{x^m}{x^{-2n}}\right)^4=x^{4m+8n}$	$x^{n(m-3)}=\left(\frac{x^m}{x^3}\right)^n$
$\left(\frac{n^3}{m^4}\right)^2$	$\frac{n^{2p}}{m^{2q}}$
$\frac{x^m}{x^{2+n}}=x^{m-n-2}$	$x^{n-m+2}=\frac{x^n\cdot x^2}{x^m}$

Potenzen: Potenzgesetze

Zerlegen	Zusammenfassen
$k^{2n+3}=k^{2n}\cdot k^3$	$k^3\cdot k^5\cdot m^4\cdot m^2=k^8\cdot m^6$
$z^{3k+4n+m}$	$z^{2+m}\cdot z^{n-1}$
$\frac{x^n}{x^{n-3}}=x^3$	$\frac{x^4-x^6}{x^2}=x^2-x^4$
k^{3+4n}	$k^7\cdot k^2\cdot m^3\cdot m^6$
$z^{k+3n+2m}=z^k\cdot z^{3n}\cdot z^{2m}$	$z^{n-3}\cdot z^{m+5}=z^{n+m+2}$
$\frac{x^3}{x^{3-n}}$	$\frac{x^6-x^9}{x^3}$
$((-m)\cdot n)^4=(-m)^4\cdot n^4$	$(-m)^3\cdot(-n)^3=(n\cdot m)^3$
$\frac{(p\cdot q)^m}{p}$	$q^3\cdot p^{m+5}\cdot q^{m+2}$
$(k\cdot m)^4=k^4\cdot m^4$	$k^n\cdot m^n=(k\cdot m)^n$
$(m\cdot(-n))^2$	$(-m)^5\cdot n^5$
$\frac{(p\cdot q)^{m+1}}{p}=p^m\cdot q^{m+1}$	$p^2\cdot p^{m+2}\cdot q^{m+4}=(p\cdot q)^{m+4}$
$k^{n\cdot(m-3)}$	$\left(k^3\cdot h^{n+3}\right)^4$
$k^{2(n+1)}=\left(k^2\right)^n\cdot k^2$	$\left(k^2\cdot h^2\right)^3=(k\cdot h)^6$
m^{7n}	$\left(m^6\right)^5$
$k^{5\cdot(m-n)}=\left(k^5\right)^m\div\left(k^5\right)^n$	$\left(k^{2+n}\cdot h^2\right)^2=(k\cdot h)^4\cdot k^{2n}$
$(k\,m)^n$	$k^7\cdot m^7$
$m^{4n}=\left(m^4\right)^n=\left(m^n\right)^4$	$\left(m^3\right)^2=m^6$
$k^{3\cdot(n+2)}$	$\left(k^3\cdot h^3\right)^4$
$x^{m+n-2}=\frac{x^m\cdot x^n}{x^2}$	$\frac{x^n}{x^{m+1}}=x^{n-m-1}$
$\frac{n^{5p}}{m^{q\cdot p}}$	$\left(\frac{n^2}{m^3}\right)^4$
$x^{2(n-m)}=\left(\frac{x^n}{x^m}\right)^2$	$\left(\frac{x^4}{x^{-2}}\right)^3=x^{18}$
$x^{n(m-3)}$	$\left(\frac{x^m}{x^{-2n}}\right)^4$
$\frac{n^{2p}}{m^{2q}}=\left(\frac{n^p}{m^q}\right)^2$	$\left(\frac{n^3}{m^4}\right)^2=\frac{n^6}{m^8}$
x^{n-m+2}	$\frac{x^m}{x^{2+n}}$