

physical quantity (SI base units in blue) (radiation physics units)	Deutsch	Symbol	SI unit	Simplified Formula to help with units	in other SI units	typical units in radiation physics	conversions
Length	Länge	l	meter = m				
time	Zeit	t	second = s				
velocity	Geschwindigkeit	v	m/s			$c \sim 3E8 \text{ m/s}$	
acceleration	Beschleunigung	a	m/s^2				
mass	Masse	m	kilogram = kg			$1\text{eV}/c^2$	$1\text{eV}/c^2 = 1.78\text{E-}36 \text{ kg}$
momentum	Impuls	p	$\text{kg}\cdot\text{m/s}$	$p=mv$			
force	Kraft	F	Newton = N	$F = ma$	$1\text{N} = \text{kg}\cdot\text{m/s}^2$		
torque	Drehmoment	τ	$\text{N}\cdot\text{m}$	$\tau = rF \sin\theta$	$\text{kg}\cdot\text{m}^2/\text{s}^2$		
energy, work	Energie, Arbeit	E, W	Joule = J	$W = Fx$	$1\text{J} = \text{kg}\cdot\text{m}^2/\text{s}^2$	1eV	$1\text{eV} = 1.602\text{E-}19\text{J}$
power	Leistung	P	Watt = W	$P = E/t$	$1\text{W} = \text{kg}\cdot\text{m}^2/\text{s}^3$		
pressure	Druck	p	Pascal = Pa	$p = F/\text{area}$	$1\text{Pa} = 1\text{N}/\text{m}^2$		
Electrical charge	Elektrische Ladung	q	Coulomb = C			$e = \text{electron charge}$	$1e = 1.602\text{E-}19\text{C}$
Electrical current	Stromstärke	I	Ampere = Amp = A	$I = q/t$	$1\text{A} = 1\text{C}/\text{s}$		
Electric potential	Elektrische Spannung	V or ϕ	Volt = V	Power = IV	$1\text{V} = 1\text{W}/\text{A}$		
Electric field	Elektrisches Feld	E	$\text{N}/\text{C} = \text{V}/\text{m}$				
Magnetic field	Magnetische Flussdichte	B	Tesla = T	$F = BI\ell$	$1\text{T} = 1\text{N}/(\text{A}\cdot\text{m})$		
Resistance	Elektrischer Widerstand	R	Ohms = Ω	$V = IR$	$1\Omega = 1\text{V}/\text{A}$		
Capacitance	Elektrische Kapazität	C	Farad = F	$C = q/V$	$1\text{F} = 1\text{C}/\text{V}$		
Temperature	Temperatur	T	Kelvin = K				
amount of substance	Stoffmenge	N	Mol				
luminous intensity	Lichtstärke	I_v	Candela = cd				
radioactivity	Radioaktivität	A_{Bq}	Becquerel = Bq		$1/\text{s}$		
Absorbed dose	Energiedosis	D_T	Gray = Gy		$\text{m}^2/\text{s}^2 = \text{J}/\text{kg}$		
Equivalent dose	Äquivalentdosis	H_T	Sievert = Sv		$\text{m}^2/\text{s}^2 = \text{J}/\text{kg}$		