The thermal de Broglie wavelength is roughly the average de Broglie wavelength of the gas particles in an ideal gas at the specified temperature. It is defined as

\[
\Lambda = \sqrt{\frac{h^2}{2\pi mk_BT}}
\]

where

- \( h \) is the Planck constant
- \( m \) is the mass
- \( (k_B) \) is the Boltzmann constant
- \( T \) is the temperature.

References

1. ↑ Louis-Victor de Broglie "On the Theory of Quanta" Thesis (1925)

Related reading


Contributors and Attributions

- SklogWiki