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$$\partial_t^2 - \Delta$$

$$\partial_t^2 - \sum_{i=1}^n v_i^2 \partial_{x_i}^2$$

is this correct?

fundamental solution

Fundamental solution to the wave equation is

$$u(x,t) := f(x-vt) + g(x+vt)$$

for any f,g .

- *superposition* of two waves waves with velocity v and $-v$
- no *dispersion*, dissipation

Current note has 0 direct children and 0 total descendants.

- [stem](#)
 - [subobjects of and functions on \$\mathbb{R}^n, S^n, \mathbb{C}^n\$ and its quotients \$\Gamma \backslash \mathbb{R}^n, \Gamma \backslash \mathbb{C}^n\$](#)
 - [equations](#)
 - $$\partial_t^2 + \sum_{i=1}^n v_i^2 \partial_{x_i}^2$$

And it has 5 siblings.

- [stem](#)
 - [subobjects of and functions on \$\mathbb{R}^n, S^n, \mathbb{C}^n\$ and its quotients \$\Gamma \backslash \mathbb{R}^n, \Gamma \backslash \mathbb{C}^n\$](#)
 - [equations](#)
 - [Equations for functions on \$\mathbb{R}^2\$](#)
 - [Quasi-linear PDEs on \$\mathbb{R}^2\$](#)
 - $$\partial_t^2 + \sum_{i=1}^n v_i^2 \partial_{x_i}^2 + m^2$$
 - [First order PDEs in \$\mathbb{R}^n\$](#)
 - $$\partial_t^2 + \sum_{i=1}^n v_i^2 \partial_{x_i}^2$$