

PSALTer results panel

$$S = \iiint \iiint (\alpha_2 (h_{\alpha\beta} h^{\alpha\beta} - h^\alpha_\alpha h^\beta_\beta) + h^{\alpha\beta} \mathcal{T}_{\alpha\beta} + \frac{1}{2} \alpha_1 (\partial_\beta h^\chi_\chi \partial^\beta h^\alpha_\alpha + 2 \partial_\alpha h^{\alpha\beta} \partial_\chi h^\chi_\beta - 2 \partial^\beta h^\alpha_\alpha \partial_\chi h^\chi_\beta - \partial_\chi h_{\alpha\beta} \partial^\chi h^{\alpha\beta})) [t, x, y, z] dz dy dx dt$$

Wave operator

$0^+ h^\perp$

$0^+ h^\parallel$

$0^+ h^\perp \dagger$

$0^+ h^\parallel \dagger$

0

$-\sqrt{3} \alpha_2$

$-\sqrt{3} \alpha_2$

$-2 \alpha_2 + \alpha_1 k^2$

$1^- h^\perp_\alpha$

$1^- h^\perp \dagger^\alpha$

α_2

$2^+ h^\parallel_{\alpha\beta}$

$2^+ h^\parallel \dagger^{\alpha\beta}$

$\alpha_2 - \frac{\alpha_1 k^2}{2}$

Saturated propagator

$0^+ \mathcal{T}^\perp$

$0^+ \mathcal{T}^\parallel$

$0^+ \mathcal{T}^\perp \dagger$

$0^+ \mathcal{T}^\parallel \dagger$

$\frac{2 \alpha_2 - \alpha_1 k^2}{3 \alpha_2^2}$

$-\frac{1}{\sqrt{3} \alpha_2}$

$-\frac{1}{\sqrt{3} \alpha_2}$

0

$1^- \mathcal{T}^\perp_\alpha$

$1^- \mathcal{T}^\perp \dagger^\alpha$

$\frac{1}{\alpha_2}$

$2^+ \mathcal{T}^\parallel_{\alpha\beta}$

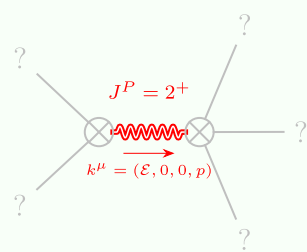
$2^+ \mathcal{T}^\parallel \dagger^{\alpha\beta}$

$\frac{1}{\alpha_2 - \frac{\alpha_1 k^2}{2}}$

Source constraints

(No source constraints)

Massive spectrum



Massive particle

Pole residue:	$-\frac{2}{\alpha_1} > 0$
Square mass:	$\frac{2 \alpha_2}{\alpha_1} > 0$
Spin:	2
Parity:	Even

Massless spectrum

(No particles)

Unitarity conditions

$$\alpha_1 < 0 \ \&\& \ \alpha_2 < 0$$