Field kinematics

Basic conventions						
Minkowski metric tensor	Totally antisymmetric tensor	Four-momentum	Four-momentum norm	Massive rest-frame		
$\eta_{\mu u}$	$\epsilon \eta_{\mu u ho \sigma}$	k^{μ}	$k^2 == k_\mu k^\mu$	$n^{\mu} == \frac{\kappa^{\mu}}{\kappa}$		
Eun dam ontal fiolds						

 $\mathcal{B}_{1}^{\#1}{}_{lphaeta}$

 $\mathcal{B}_{1^{-}\ lpha}^{ ext{\#}1}$

Fundamental field Symmetries

Symmetry[2, $\mathcal{B}_{1}^{\#1} \bullet 1 \bullet 2$, $\{ \bullet 1 \rightarrow -a, \bullet 2 \rightarrow -b \}$,

StrongGenSet[{1, 2}, GenSet[-(1,2)]]]

Source

Source

${\cal B}_{lphaeta}$	StrongGenSet[{	1, 2}, GenSet[-(1,2)]	$\left. \left. \left$	$n_{\alpha} + \mathcal{B}_1^{\#}$
SO(3) irreps				
SO(3) irrep Symm	etries			Expans

Symmetry[1, $\mathcal{B}_{1}^{\#1} \bullet 1$, $\{ \bullet 1 \rightarrow -a \}$, StrongGenSet[$\{ \}$, GenSet[$\} \}$] $\mathcal{B}_{\alpha\beta} n^{\beta}$

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) irreps	
irrep Symmetries	Expansion in terms of the fundamental field

Symmetry[2, $\mathcal{B}^{\bullet 1 \bullet 2}$, $\{ \bullet 1 \rightarrow -a, \bullet 2 \rightarrow -b \}$, $\mathcal{B}_{1^{+} \alpha \beta}^{\# 1} - \mathcal{B}_{1^{-} \beta}^{\# 1} n_{\alpha} + \mathcal{B}_{1^{-} \alpha}^{\# 1} n_{\beta}$

Decomposition in SO(3) irreps

 $\mathcal{B}_{\alpha\beta} + \mathcal{B}_{\beta\chi} \, n_{\alpha} \, n^{\chi} - \mathcal{B}_{\alpha\chi} \, n_{\beta} \, n^{\chi}$

$$\left|\epsilon\eta_{\mu\nu\rho\sigma}\right| \qquad \left|k^{\mu}\right| \qquad \left|k^{2}==k_{\mu}\;k^{\mu}\right| \qquad \left|n^{\mu}==\frac{k^{\mu}}{k}\right|$$
 damental fields

$\eta_{\mu u}$	$\epsilon \eta_{\mu \nu \rho \sigma}$	k^{μ}	$k^2 == k_\mu k^\mu$	$n^{\mu} == \frac{k^{\mu}}{k}$
Fundamental fields				

asic conventions nkowski metric tensor | Totally antisymmetric tensor | Four-momentum | Four-momentum | norm | Massive rest-frame |
$$\epsilon \eta_{\mu\nu\rho\sigma}$$
 | $\epsilon \eta_{\mu\nu\rho\sigma}$ | $\epsilon \eta_{\mu\nu\rho}$ | ϵ