

**Table S4: Sensitivity analysis: reduction in otitis media progression rate after vaccine introduction, calculated without excluding children experiencing respiratory illness from carriage sample.**

Age group	Ethnicity	Vaccine-targeted serotypes			Non-vaccine serotypes
		PCV7 serotypes	+6 PCV13 serotypes	All PCV7 and PCV13 serotypes	
0-11 months	Bedouin children	<b>0.91 (0.33, 0.99)</b>	<b>0.91 (0.43, 0.98)</b>	<b>0.92 (0.77, 0.97)</b>	<b>0.76 (0.61, 0.86)</b>
	Jewish children	<b>0.85 (0.00, 0.97)</b>	0.79 (-1.34, 0.97)	<b>0.84 (0.51, 0.94)</b>	<b>0.55 (0.23, 0.75)</b>
12-35 months	Bedouin children	0.28 (-2.38, 0.81)	0.40 (-1.84, 0.89)	0.34 (-0.46, 0.69)	0.34 (-0.01, 0.57)
	Jewish children	0.45 (-2.75, 0.91)	0.71 (-0.95, 0.98)	0.60 (-0.08, 0.86)	0.07 (-0.61, 0.42)

Effects of vaccine introduction on progression rate presented as median (95% credible interval) and pooled from serotype-level measurements using a Bayesian random effects model.