

PAEDIATRIC REFERENCE RANGES

Normal - vital signs

AGE (years)	HEART RATE (bpm)	RESPIRATORY RATE (per min)	SYSTOLIC BP (mmHg)
<1	110 to 160	30 to 40	70 to 90
1 to 2	100 to 150	25 to 35	80 to 95
2 to 5	95 to 140	25 to 30	80 to 100
5 to 12	80 to 120	20 to 25	90 to 110
>12	60 to 100	15 to 20	100 to 120

Reference:

Adapted by Starship with slight modifications from the Advanced Life Support Group (ALSG) – Advanced Paediatric Life Support, 5th Edition

Moderate illness – vital signs

AGE (years)	HEART RATE (bpm)	RESPIRATORY RATE (per min)
<1	150 to 159	50 to 59
1 to 2	140 to 149	40 to 49
3 to 4	130 to 139	35 to 39
5	120 to 129	27 to 28
6 to 7	110 to 119	24 to 26
8 to 11	105 to 114	22 to 24
≥12	91 to 130	21 to 24

Reference:

Sourced from: National Institute for Health and Care Excellence – Sepsis: Recognition, Diagnosis and Early Management

Severe illness – vital signs

AGE (years)	HEART RATE (bpm)	RESPIRATORY RATE (per min)
<1	≥160	≥60
1 to 2	≥150	≥50
3 to 4	≥140	≥40

5	≥130	≥29
6 to 7	≥120	≥27
8 to 11	≥115	≥25
≥12	≥130	≥25

Reference:

Sourced from: National Institute for Health and Care Excellence – Sepsis: Recognition, Diagnosis and Early Management

Weight estimates

AGE (years)	ESTIMATED WEIGHT (kilograms)
1 to 12 months	(0.5 x age in months) + 4
1 to 5 years	(2 x age in years) + 8
6 to 12 years	(3 x age in years) + 7

Reference:

Emcare: Principles of Advanced Care Life Support – Course supplementary pre-reading