

Formula to calculate physical growth of children

Normal Infant (between 1 to 12 month of age:

a. Weight: the infant gains:

Birth to 4 months	$\frac{3}{4}$ kg/month. →	} + birth weight
5 to 8 months	$\frac{1}{2}$ kg/month. →	
9 to 12 months	$\frac{1}{4}$ kg/month. →	

Another way of calculating the weight for infant age 3 to 12 months or the mother can't remember birth weight:

$$\text{Weight} = \frac{\text{Age in Month} + 9}{2}$$

b. Height:

Length increases about

Birth to 3 months	3cm /month. →	} + birth length
4 to 6 months	2cm /month. →	
7 to 12 months	1.5 /month. →	

c. Head Circumference:

Birth to 3 months	2cm /month. →	} + birth H.C
4 to 12 months	0.5 /month. →	

Normal Toddler Normal preschool Stage

- **normal weight of children over 1 year of age=**

$$\text{Age in years} \times 2 + 8 = \dots\dots\dots \text{Kgm.}$$

- Formula to calculate **normal height of children over 1 year of age=**

$$\text{Age in years} \times 5 + 80 = \dots\dots\dots \text{cm.}$$

Normal School – Age Child

Weight:

$$\text{Formula for 7 to 12 years} = \frac{(\text{age in years} \times 7) - 5}{2}$$

$$\text{Height: Age in years} \times 5 + 80 = \dots\dots\dots \text{cm.}$$

To determine if the child in normal range:

$$\text{Upper limit} = \text{average (Wt or Ht or H.C)} \times 105 / 100$$

$$\text{Lower limit} = \text{average (Wt or Ht or H.C)} \times 95 / 100$$