



# Suposhit Bharat Abhiyaan

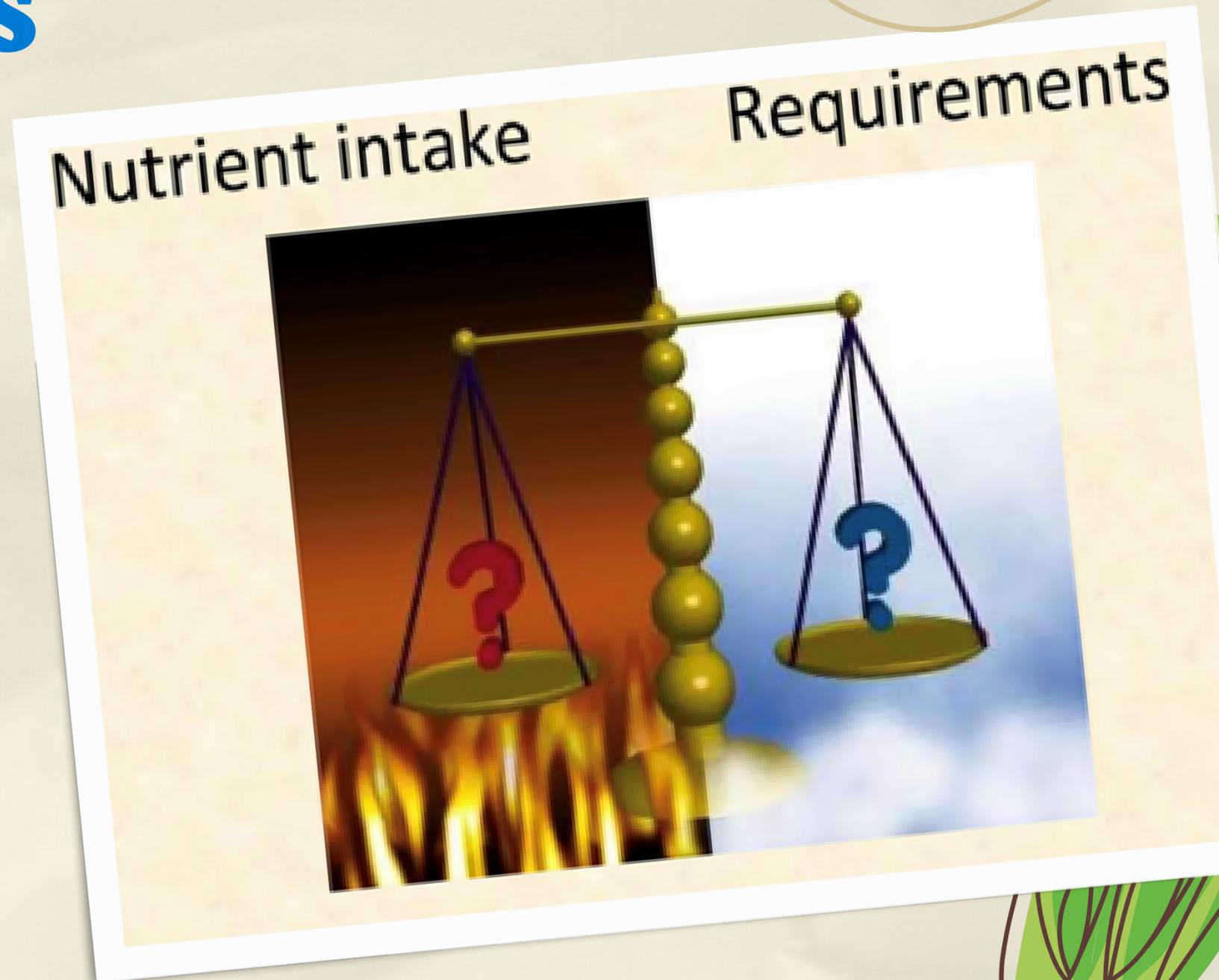


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# Problem Area

## Nutritional status

- Nutritional status is the current body status, of a person or a population group, related to their state of nourishment (the consumption and utilization of nutrients)
- An ideal nutrition status occurs when the supply of nutrients conforms to the nutritional requirements



# WHAT IS NUTRITIONAL STATUS ?

## The nutritional status of an individual

- is a balance between the intake of the nutrients and the expenditure of these in processes of growth, reproduction and health maintenance.
- is influenced by food intake, Quantity, quality and physical health.

The spectrum of nutritional status spreads from obesity to severe malnutrition.

Lack Nutrition  
Called  
Under Nutrition



Excess Nutrition  
Called  
Over Nutrition



# Nutritional Problems – Few Examples

- **Severe wasting is the most lethal form of undernutrition, and one of the top threats to child survival.**

Around 1 in 5 deaths among children under 5 are attributed to severe wasting—caused by a lack of nutritious food and repeated bouts of diseases such as diarrhoea, measles and malaria.

- **NFHS(2019-21)**
  - 5 years have improved as compared with NFHS-4 (2015-16).
  - Stunting has reduced from 38.4% to 35.5%,
  - Wasting has reduced from 21.0% to 19.3%
  - Underweight prevalence has reduced from 35.8% to 32.1%.



# Nutritional Problems – Few Examples

- According to a series of articles in The Lancet, more than 3 million child deaths every year are associated with malnutrition.

**Nearly half of all children who die each year do so because they don't have access to enough of the right food.**





# Nutritional assessment

## Why?

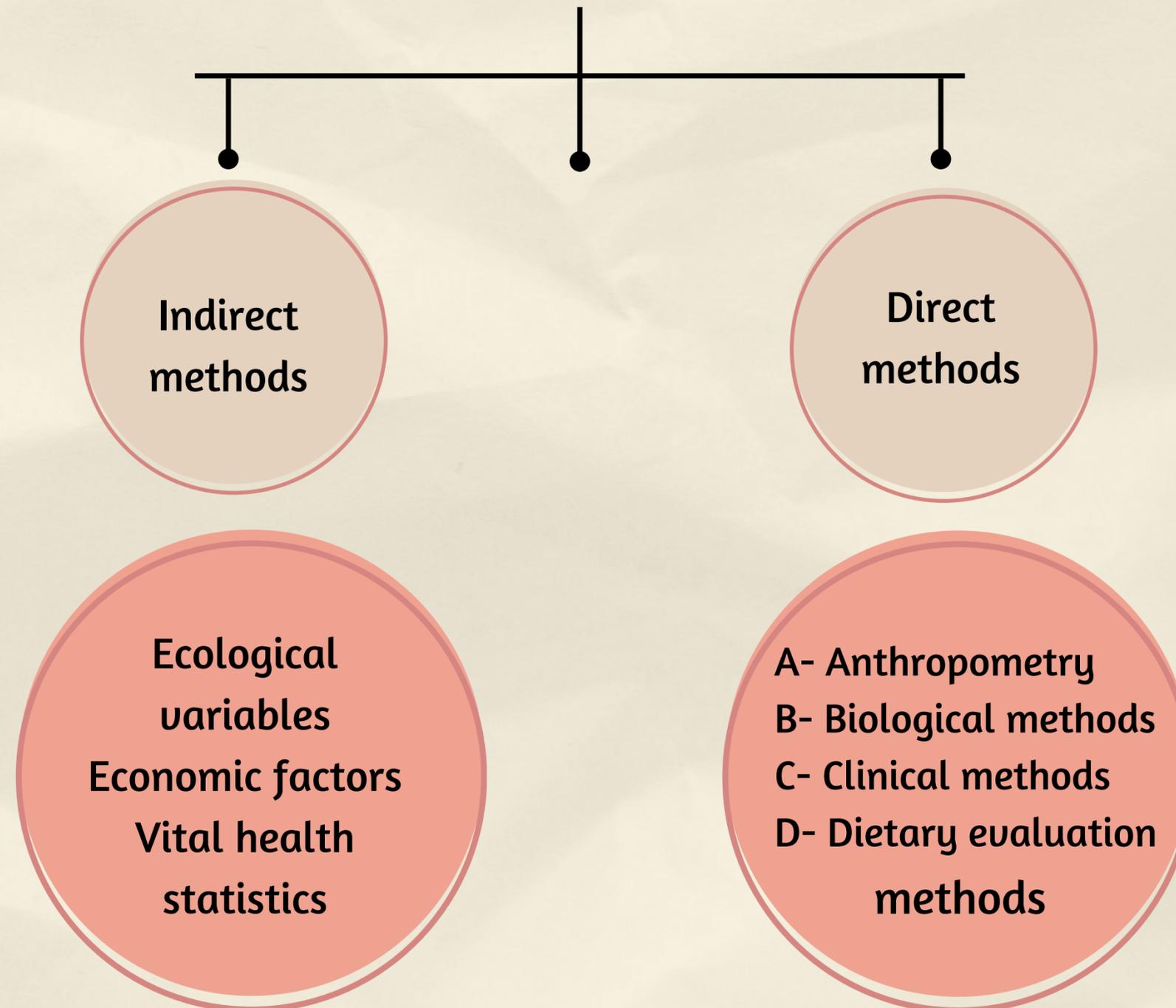
- To obtain precise information on prevalence and geographic distribution of nutritional problems of given community
- To identify individuals or populations
  - who are at risk of becoming malnourished &
  - who are already malnourished
- To develop health-care programs
- To measure the effectiveness of nutritional programs and interventions once initiated

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**Kesari A, Noel JY. Nutritional Assessment. In: StatPearls [Internet]. Treasure Island (FL): StatPearls Publishing; 2023 [cited 2023 Jul 24].**

Available from: <http://www.ncbi.nlm.nih.gov/books/NBK580496/>

# Nutritional Assessment Methods

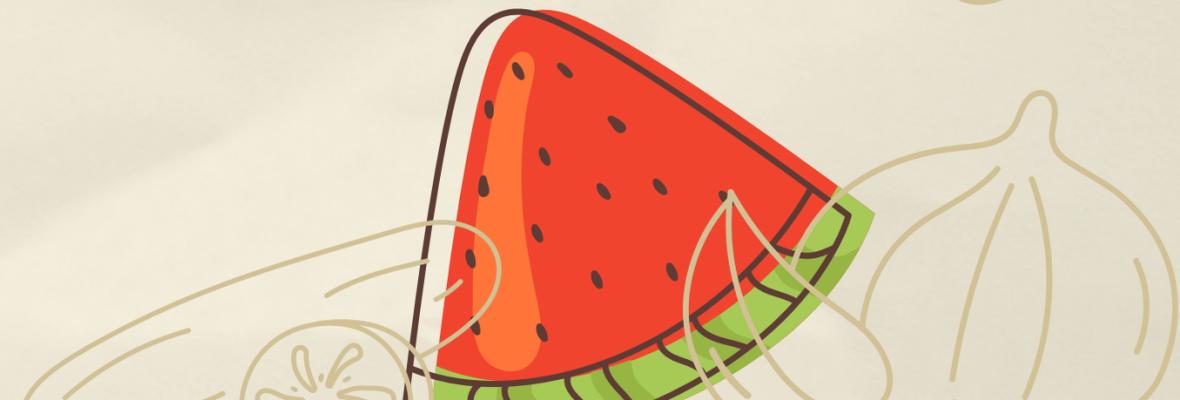


Shrivastava. Assessment of nutritional status in the community and clinical settings [Internet]. [cited 2023 Jul 24].

Available from: <https://www.jmedscindmc.com/article.asp?issn=1011-4564;year=2014;volume=34;issue=5;spage=211;epage=213;aualast=Shrivastava>

# Anthropometry

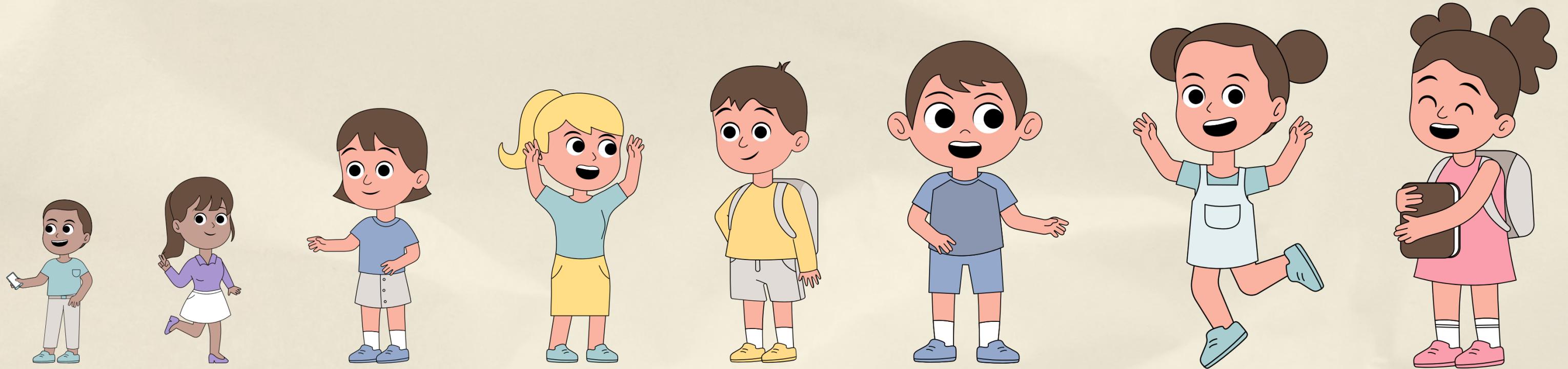
- Measurements of body height, weight, mid-upper arm circumference, etc.
- These measurements are compared to the reference standard
- Other anthropometric measurements include –
  - Waist circumference
  - Hip circumference
  - Head circumference
  - Skin-fold thickness



# 1. Anthropometry - Height

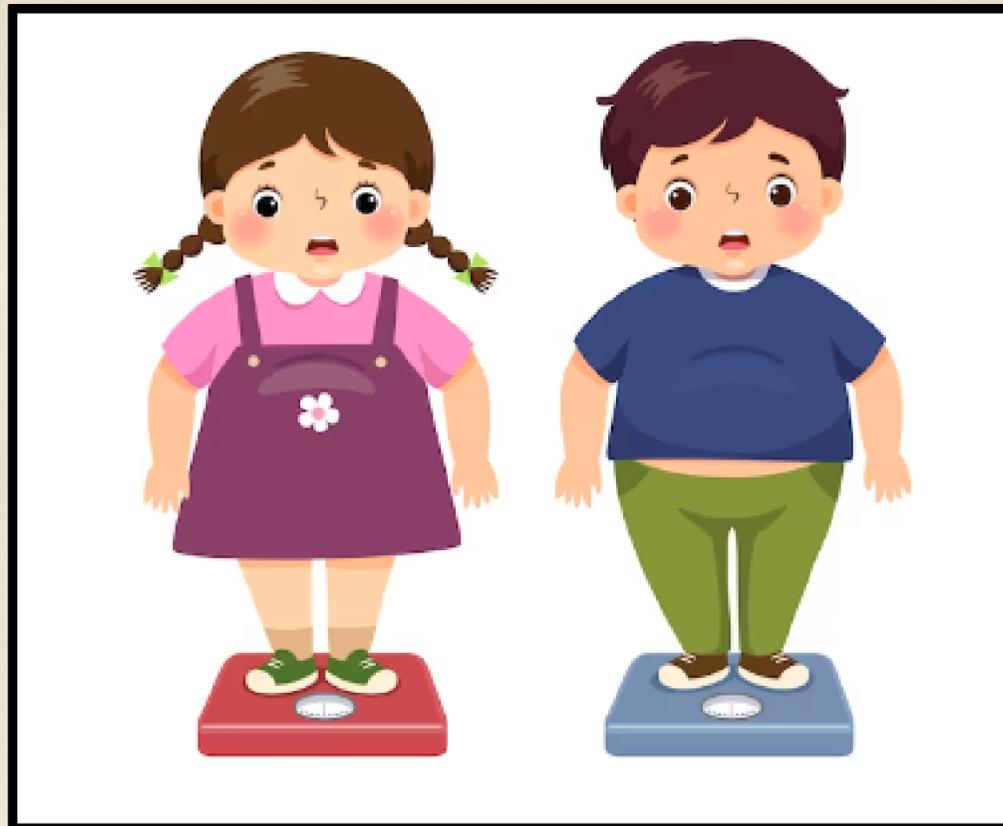
1. Remove the child's shoes, bulky clothing, and hair ornaments, and unbraid hair that interferes with the measurement.
2. Take the height measurement on flooring that is not carpeted and against a flat surface such as a wall with no molding.
3. Have the child stand with feet flat, together, and against the wall. Make sure legs are straight, arms are at sides, and shoulders are level.
4. Make sure the child is looking straight ahead and that the line of sight is parallel with the floor.
5. Make the child stand with head, shoulders, buttocks, and heels touching the flat surface (wall). (See illustration.)
6. Use a flat headpiece to form a right angle with the wall and lower the headpiece until it firmly touches the crown of the head.

7. Make sure the measurer's eyes are at the same level as the headpiece.
8. Mark where the bottom of the headpiece meets the wall. Then, use a inelastic tape to measure from the base on the floor to the marked measurement on the wall to get the height measurement.
9. Accurately record the height to the nearest 0.5 centimeter.



## 2. Anthropometry – Weight Charting

1. Use a digital scale. Avoid using bathroom scales that are spring-loaded. Place the scale on firm flooring (such as tile or wood) rather than carpet.
2. Have the child remove shoes and heavy clothing, such as sweaters.
3. Have the child stand with both feet in the center of the scale.
4. Record the weight to the nearest decimal fraction (for example 25.1 kilograms).



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**Plotting Growth Charts:** Paste a Growth chart (sex appropriate) at the space provided. If available fill earlier available weights in the chart including birth weight). Now plot weight for each of the visit that you have made and make appropriate interpretations about rate of growth.

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## 2. Anthropometry – Weight Charting

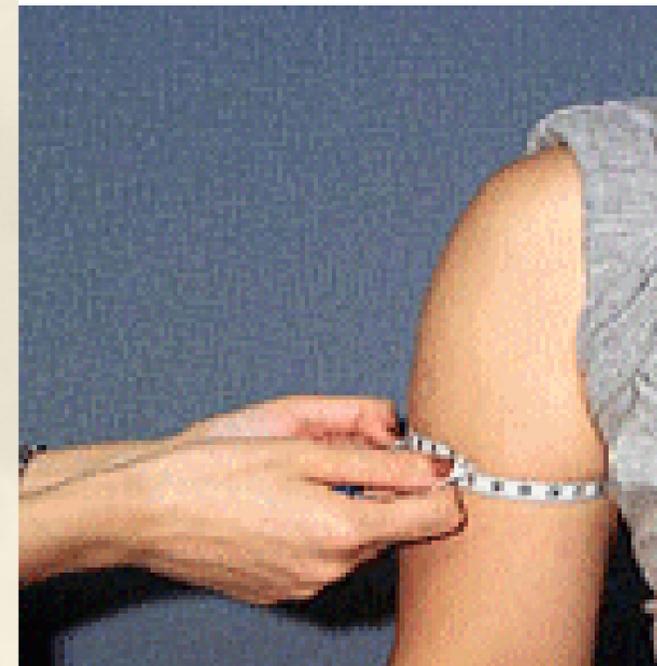
- The double burden of malnutrition (under- and overnutrition) is a serious public health issue in childhood.
  - MUAC is a simple tool for screening nutritional status,
  - Many studies indicated MUAC as an independent tool for diagnosing malnutrition in children aged 6-59 months.
  - Shakir tape is used to measure MUAC



# Anthropometry- Mid-upper arm circumference (MUAC)

## 3. Mid Upper-arm Circumference

- Circumference left upper arm at mid point between acromion process and olecranon process
- Fiber-glass tape which does not stretch



# Mid-upper arm circumference (MUAC)

- Shakir tape is used to screen for malnutrition in community and hospital settings.

13.5 cm is malnutrition

11.5 to 12.5 – Moderate Malnutrition

11.5 – Severe malnutrition

**Screening children for malnutrition**

In nutrition centres in Cox's Bazar camp, Concern's team use MUAC (mid-upper arm circumference) bands to screen children under five years old for malnutrition. All children who are in the red and orange zone are at serious risk and are in urgent need of therapeutic food.

*Tahira's MUAC measurement showed she was severely malnourished. You can help provide life-saving food to more children like Tahira.*

Red - severe malnutrition      Orange - moderate malnutrition      Green - healthy child

# Strengths & limitations – Anthropometry methods

## Strengths

- High specificity and sensitivity.
- Measures many variables of nutritional significance (ht, wt, MUAC, WHR , BMI)
- Readings are numerical and gradable on standard growth charts.
- Readings are reproducible
- Non-expensive
- Needs minimal training

## Limitations

- Inter-observers error in measurement.
- Limited nutritional diagnosis.
- Problems with reference standards i.e. local versus international.

# Body Mass Index

$$\text{BMI} = \text{weight in KG} / \text{Height in Meters(m)}^2$$

BMI Cutoff for Asians and Asian Americans	NIH BMI Cutoff	Comments
<18.5	<18.5	Your weight is <b>below healthy range</b> . This can put you at risk for developing many health problems. Talk to your healthcare provider about your ideal body weight.
18.5 - 22.9	18.5 - 24.9	Your weight is <b>within healthy range</b> . Continue exercising and eating healthfully.
23 - 26.9	25 - 29.9	Your weight is <b>above healthy range</b> . Your risk for developing type 2 diabetes and other chronic diseases are higher. Talk to your healthcare provider about your ideal body weight and how to make healthy lifestyle changes.
$\geq 27$	$\geq 30$	Your weight is <b>further above healthy range</b> . It increases the risk for developing many chronic diseases such as heart disease and type 2 diabetes, and decreases overall quality of life. Talk to your healthcare provider about your ideal body weight and how to make healthy lifestyle changes.

- **Palak- SwasthyAyaamPramukh**
- **Pramukh- Suposhit Bharat Abhiyaan**
- **Different Team of Volunteers for Survey of**

1. Geographical Area

2. Basti Identification

3. Inhabitants

4. Analysis of the outcome of point no 3,

5. Zero in of the Area of Assignment

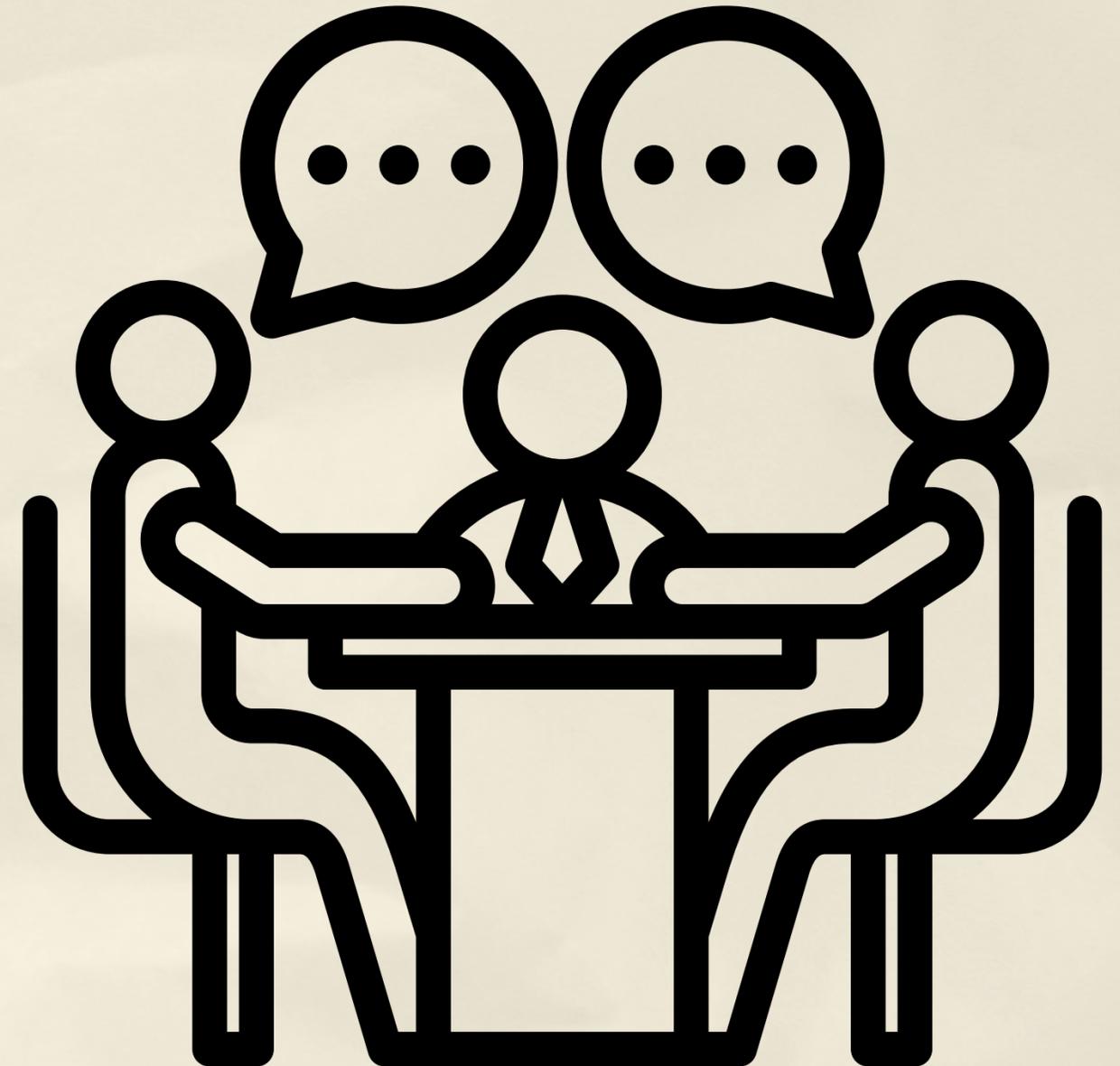
6. Role of the Team

a. Motivation    b. Medication    c. Supplements

d. Data Recording    e. IEC material

# Advisory Team

- Paediatrician
- Dietician
- Physician
- Gynaecologist
- Naturopath/ Yoga
- Data analyst /Stasticis
- Vibhag swasth ayaam pramukh



# ROPE IN- Coordinate with

- Coordination Amongst all Govt. Schemes and Offices
- Local Bodies and Officers /Popular personalities/ Impactful Persons.
- Like Teachers of School, Local Leaders, Front Line workers of the H&FW workers, Self Help Groups, NCC , Scouts and Guides ,
- USE Local Language and Dialect.
- IEC Material In Local Language.
- Identification for Local Seasonal Natural Supplements available in abundance, Locally.

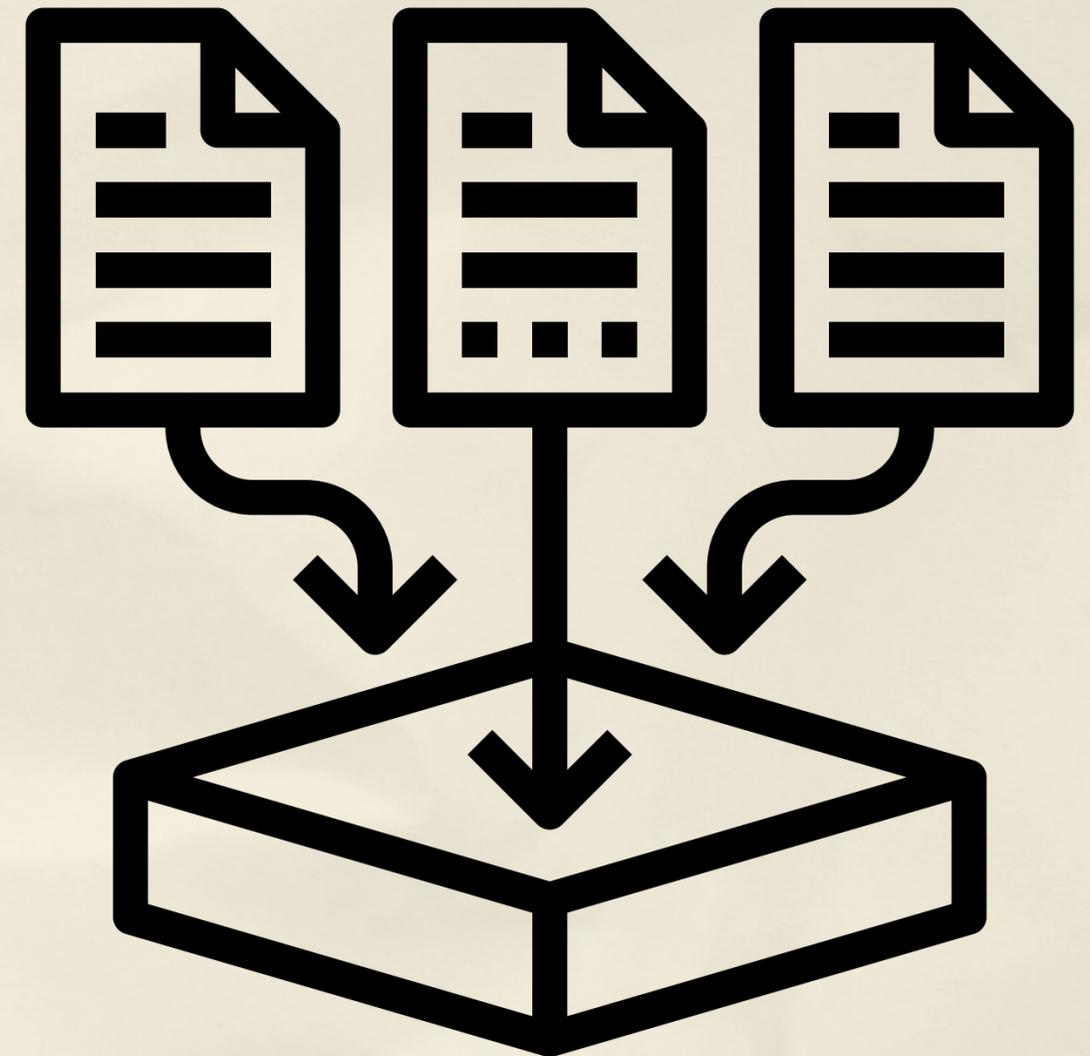
# Up to – Follow UP

Sr No	Target	Aim
1.	Preventing Stunted Growth( 0-6 ) yrs	2% / Year , Upto 6%
2.	Preventing Mal Nutrition (0-6) yrs	2% / Year , Upto 6%
3.	Preventing Anemia (0 to 59 months )	3% / Year , Upto 9%
4.	Preventing Anemia in 15-59 Years Adolescent Girls and Females	3% / Year , Upto 9%
5.	Preventing Low Birth Weight Deliveries	2% / Year , Upto 6%

**Follow UP every Three Months till six Months or refer**

# Data Management

- Subject Card individually
- Google Sheet
- Google Form
- Excel Sheet
- Apps Available : Government



# Demographic Data

1. Name

2. Father's Name

3. Age

4. Gender

5. Phone

6. Address

**MUAC Number in Age group ( 0-60 ) months**

**BMI for 60 months - onwards**

# Data for Malnourishment

- Mid Upper Arm Circumference for Understanding Mal-nourishment
- Severe < 11.5
- Mild < 12.5 to 13.5
- Normal > 13.5
- BMI for Understanding Mal-nourishment
- Under weight <18.5 kg / mt<sup>2</sup>
- Normal weight 18.5 to 22.9 kg/ mt<sup>2</sup>
- Over weight > 23 upto 25
- Obesity 25>

# Resources Govt of Bharat



# Resource Ayush

# Summary

As per National Family Health Survey - 4 (2015-16)



## MALNUTRITION AMONGST CHILDREN (0-5 YEARS)

Stunting (Low Height for Age)	38%
Wasting (Low Weight for Height)	21%
S. Wasting (Below 3SD)	7%
Underweight (Low Weight for Age)	36%



## ANAEMIC (<11 GMDL) WOMEN 15-49 YEARS

Pregnant Women	NFHS-3 (2005-06)	NFHS-4 (2015-16)
	58%	50%
Women (General)	NFHS-3	NFHS-4
	55%	53%

## Let's ponder over the following:

1

Is there a lack of adequate education in our communities towards food intake for children & women?

2

Is there a poor understanding of the mother & family to raise the child, particularly a girl child?

3

Is there adequate or poor food intake by women during pregnancy & lactation?

4

Is there frequent child bearing in communities?

5

Is there an increase in number of low birth weight babies?

6

Is there a lack of awareness about exclusive of breastfeeding & immunization?

7

Is the cultural norm a barrier in food preparation & consumption?

8

Is there a lack of knowledge about nutrient deficiencies & its intergenerational impact?



All this happens, as there exists a gap in food based knowledge & practices which supports human life.

These gaps lead to poor nutritional status, also called under nutrition in the body. This in the long run deprives children of their future, where as good nutritional status enables them to survive, grow, develop, learn, participate and contribute.

Under nutrition is technically defined by the term Malnutrition, where an individual is not consuming enough calories, protein, vitamins & minerals from the daily diet.

# Summary





# Who are We

- Master Trainers
- Guiding Team for the Prant Prakalp



Thank you!

