TRAINING FOR IMPROVED PRACTICE:
Public Health and Nutrition in Emergencies

Nutritional and Food Security Surveillance

Annalies Borrel and Helen Young,
Feinstein International Famine Centre, Friedman School of Nutrition,
Tufts University.

UNICEF Core Corporate Commitments Training In collaboration
with:

Feinstein
International
Famine Center,
Tufts University

Mailman School of
Public Health,
Columbia University

International Emergency
and Refugee Health Branch,
Centers for Disease Control

Overview

- Objectives and characteristics of nutritional surveillance

- Different types of surveillance
  - Repeated Nutrition Surveys
  - Clinic-based Surveillance
  - Sentinel Site Food Security and Nutritional Surveillance

Exercise
Examples of Nutritional Surveillance

P. 5 to 10 of the FIVIMs report

- What was the data used for?

- How was the data obtained i.e. through what structure or method?

Participant Presentation

Examples…

- ## Bangladesh
  - nationwide monitoring used to monitor impact of floods on nutritional status & response
- ## Ethiopia
  - Repeated surveys to target food aid and assess impact (drought & food relief, seeds/tools, SFPs/TFPs)
- ## Ghana
  - Clinic based monitoring data used to detect deterioration in nutritional status & declaration of emergency & request for assistance
- ## Bangladesh
  - Nationwide community (village) based growth monitoring for screening, follow-up and monitoring for SFP.   Also BMI of pregnant women in the SFPs. Support national decision-making for resource allocation
- ## **Sudan**
  - Community based nutritional surveillance for timely early warning (sentinel sites).
- ## Costa Rica & Panama
  - School census in 1979 & 1989.   Indicator of improvements in 'quality of life' (stunting)

Objectives of Surveillance Systems

- Programme design
- Programme management and evaluation

- Policy making

- Crisis management or early warning

- Advocacy

All have potential.

Bangladesh SFP for children & pregnant women,   Ethiopia targeting of food aid & evaluation

Costa Rica??

Bangladesh Floods; Drought in Darfur; Ghana

Darfur, Sudan,

Ghana

6

Formulate objectives

Take one example and formulate an appropriate objective.

- Specific
- Measurable
- Achievable
- Realistic
- Timebound

Methods Used in Surveillance in Emergencies and Ongoing Crises

- Repeated Nutrition Surveys
- MCH based Surveillance
- Sentinel Site Food Security and Nutritional Surveillance

- (census data)

Key Indicators

- Nutritional Status (table 1 p18)
 - WFA, WFH, BMI, HFA, low birthweight.

What other information do you need?

- Food Security (existing sources e.g? Where else and at what level?)
- Care
- Public Health, Water & Sanitation (HIS)

Must relate to objectives

Repeated Surveys for Surveillance
Melange, Angola

Humanitarian access denied, general food ration interrupted

General food ration phased out

General ration re-established

Legend: Acute malnutrition | Mortality

Left axis: % of acute malnutrition (0–40)
Right axis: CMR (Deaths/10,000/day) (0–2)

X-axis: Nov '93, Feb '94, May '94, Sep '94, Dec '94, Apr '95, Oct '95, Apr '96, Jul '96
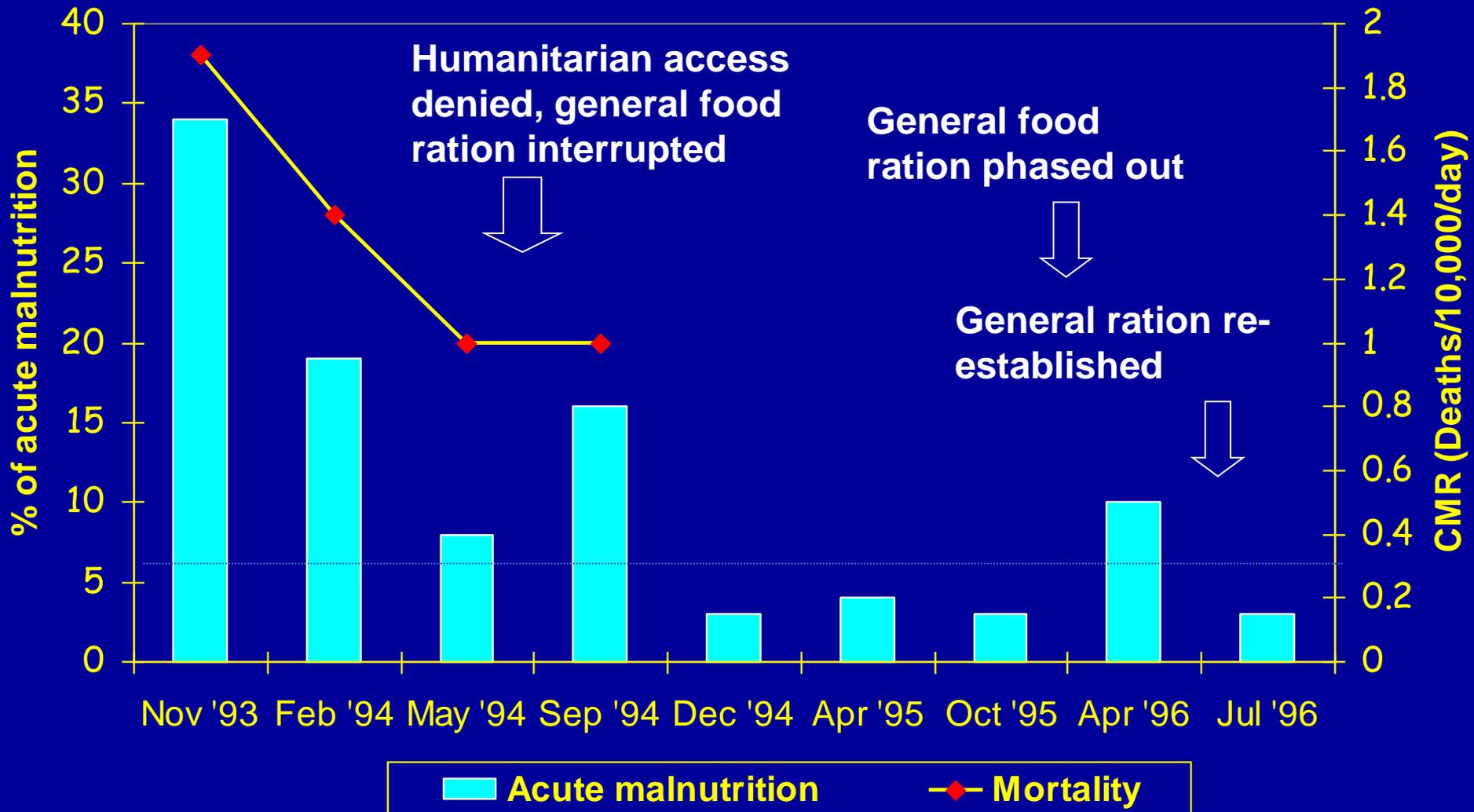
Source: Borrel, A. and Salama, P. (1999) Disasters 19:4.

Kabul Afghanistan ('97 – '02)
Total Admissions to SFPs

Evolution of beneficiaries in the therapeutic feeding centres - Since May 1997 up to May 2002 - Kabul
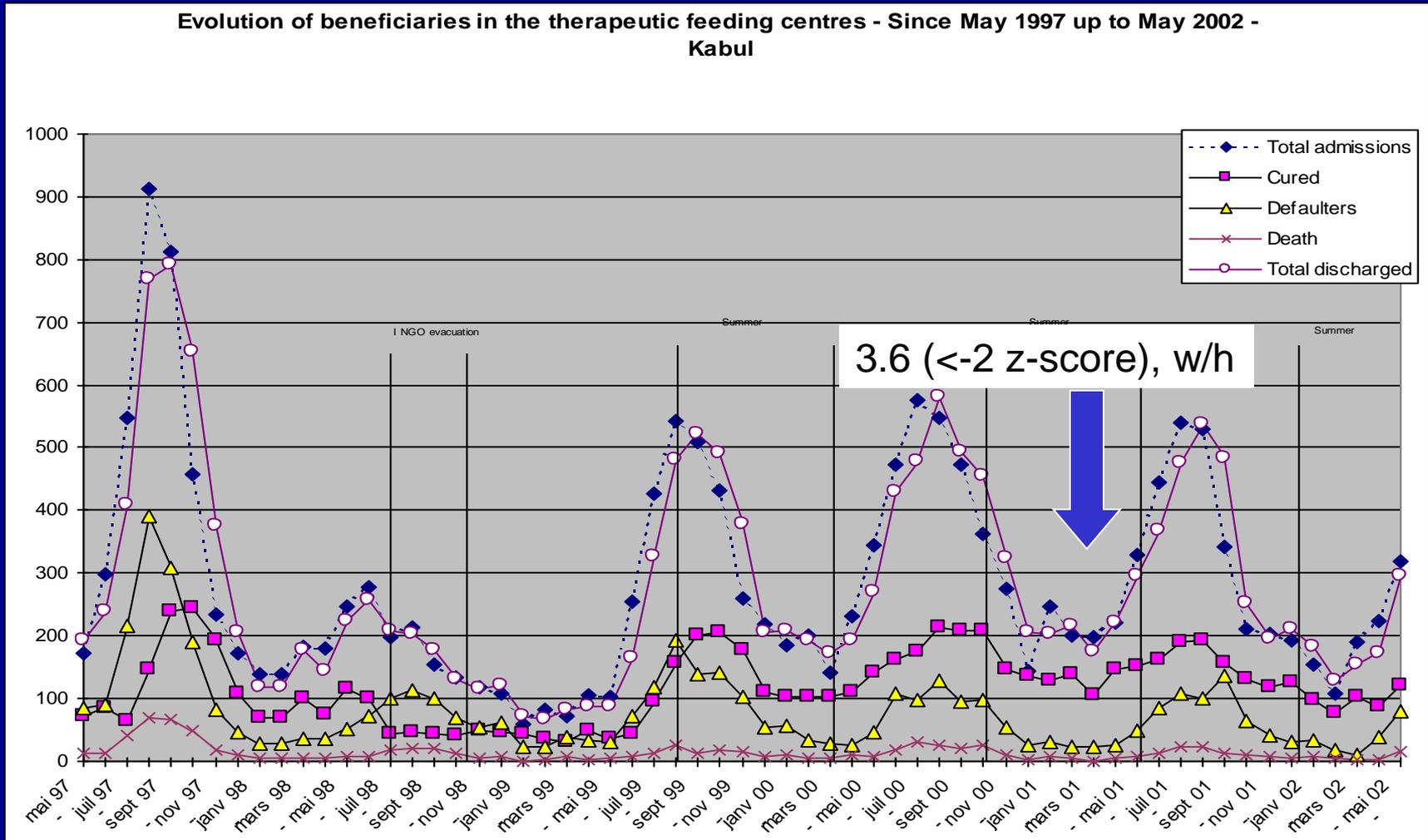
3.6 (<-2 z-score), w/h

August 2003 - 11. 6% (<-2 z-score, weight for height)

Bhutanese Refugees in Nepal:
Surveillance (Jan '94 - Mar '96)

Source: ENN, Issue 5; 1998

12
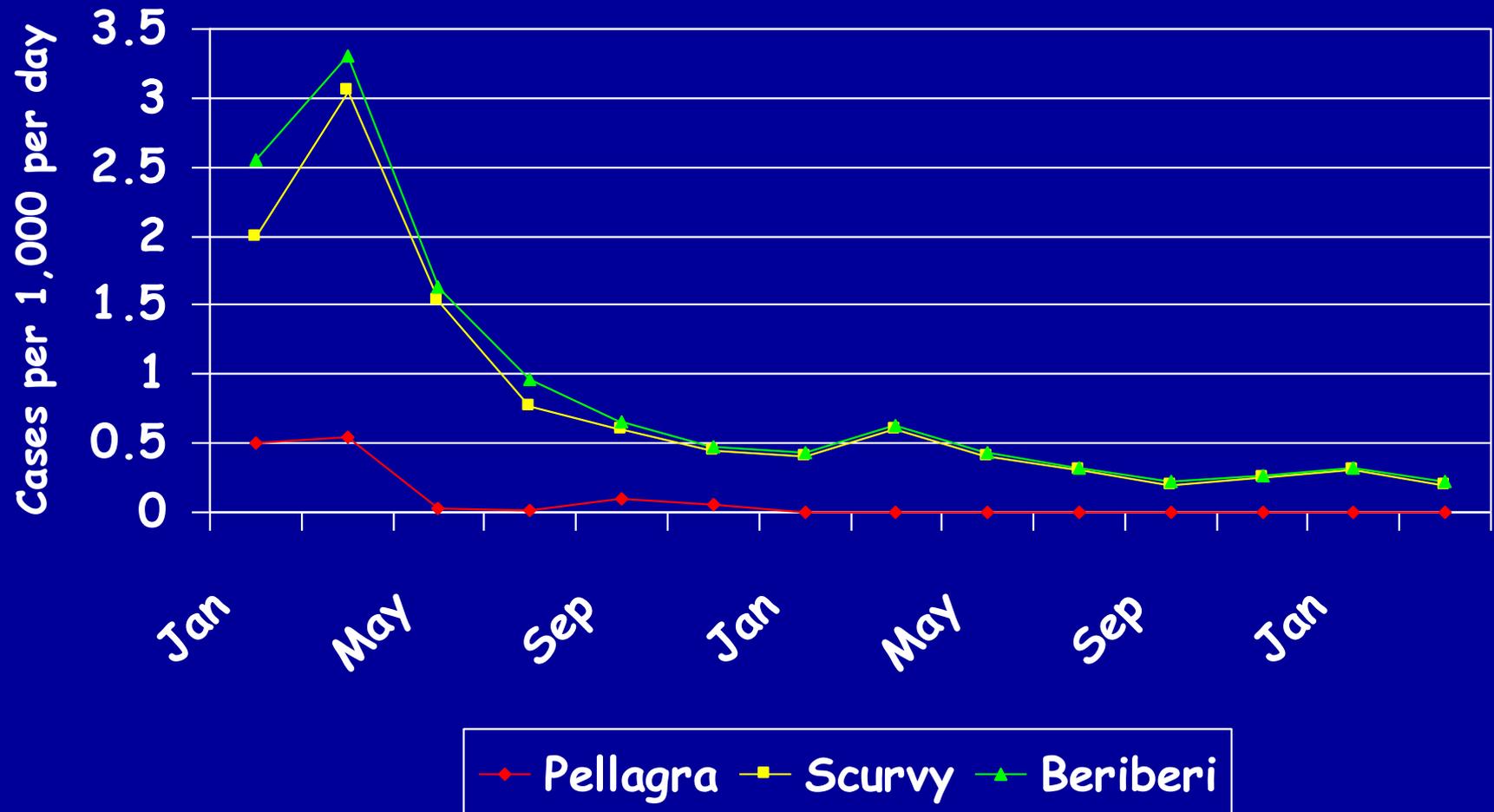
Clinic-based: Growth Monitoring
Advantages & Disadvantages

Advantages	Disadvantages
• Information already collected as management tool for mothers ('growth promotion)	• Population attending clinics not representative
• Building and strengthening existing national health information system	• Growth Monitoring designed as a 'growth promotion' tool
	• Adequacy of:
	– Skills
	– equipment
	– analysis
	• Composite index
	• Timeliness & challenges of centralised analysis
	• Growth monitoring data not useful in isolation

Characteristics of a Surveillance System

- Simple
- Flexible
- Acceptable
- Representative
- Timely
- Useful
- Affordable

UNICEF's Role

- Importance to UNICEF and national goverments?

- Opportunities for inter-agency collaboration (FAO, WHO, WFP, World Bank, INGOs)

- Future technologies & opportunities– are we investing enough?

- Resources

Review and Conclusions

- Objectives – relevance?
- Causes of malnutrition (complementarities)
- Flexibility & range of approaches
- Replicability and reliablity