People and Health

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A people’s perspective in nutrition education

Efforts to combat malnutrition through community education are often unsuccessful, due to inadequate planning and poor understanding of target populations. In Thailand, a child growth and development project is researching and using models of local attitudes to enhance programme planning. Results indicate that nutrition education programmes can benefit from awareness that community members justify their nutritional and health behaviours according to indigenous rather than academic models.

Community involvement in primary health care and its nutrition education component are technical and social necessities. Virtually every developing nation accepts this principle, and many realize it through the use of community health workers. Yet there are failures when national health systems try to make effective use of community health workers in nutrition education programmes (1). The reasons range from poor selection, and inadequate training and supervision by central agencies, to inadequate motivation, lack of rewards, and weak leadership among community workers (1, 2). Many failures are due to inadequacies in planning and management, and cannot be attributed to either the concept of community health work or the performance of individual workers (1). Often in nutrition education the central programme planners lack a true understanding of the local population’s constraints and beliefs (3). More significantly, they do not consider health and nutrition matters in the context of the rural community members’ lives and existing behaviours and practices.

An ongoing child growth and development project in Thailand shows how programmes can be planned and delivered more effectively through use of local explanatory models. These models reveal why the community will accept or reject any new health interventions and behavioural

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changes that may be proposed by health workers; they also aid health developers to take into account the people's perspective, by incorporating their knowledge and wisdom into programme planning. Where conflicts occur between lay persons and professionals like community health workers and nutrition educators, the models help to identify inconsistencies and remove key obstacles to effective behavioural change and interaction (4).

Project objectives and methods

The goal of nutrition education is to facilitate change in health-related practices and, in turn, health status. This entails revealing what people are actually doing with regard to nutrition, why they are doing it and the sociocultural context in which these actions thrive. The integrated child development services scheme (home-based approach), a three-year project (1990–92) supported by UNICEF and the Christian Children’s Fund in Thailand, is an intersectoral programme of the Thai Ministries of Public Health and Interior and the Institute for Population and Social Research at Mahidol University. The main objective is to develop a procedure to provide age-appropriate care and education for rural children through an integrated nutrition, health and educational services programme, carefully designed to match the community’s life-style.

The project entails three phases: (1) research; (2) intervention development and implementation; and (3) evaluation. The data presented here were obtained using anthropological principles and methods during the first phase (July to September 1990), by interviewing 240 households in eight villages (four each in northern and northeastern Thailand; total households, 800). In each village, ten in-depth interviews were held with mothers of malnourished children 0–6 years of age, and ten with mothers of normally developed children of the same age group. Further, ten key informant interviews were conducted with village health workers, leaders, midwives, and/or knowledgeable elderly community members. This phase’s main objective was to ascertain existing household and community behaviours, perceived needs, and overt and underlying cognitive processes affecting the prevalence of malnutrition at both home and community levels. This information forms the basis for the second phase, i.e., planning and development of home-based intervention programmes for implementation later this year.

In considering the total body of research data, the project utilized the explanatory model framework, which has been used extensively to explain differences between lay and clinical interpretations and responses to illness (4).

These models take into account the ideas and beliefs of individuals, families, and communities concerning certain foods, illness and its causation, and the required

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treatment. They explain behaviours on the basis of processes that may justify each individual’s actions. In the project the models serve as reference points for interpreting existing behaviours and practices which are crucial to programme
planning. The models are based on data that emerge during the interviews as well as other data on indigenous classification systems. After comparison with previous research data, a pattern for the model appears which is then checked for validity and reliability with key informants. Adjustments are made until the model is acceptable to both the people and the researchers.

Local models

Culturally-based model for child growth and development

A three-stage, culturally-based model for child growth and development in the study areas was used to assess both current and new food and nutrition practices. The stages were developed by analysing interview data on the growth and development of well-nourished children, as opposed to their malnourished counterparts, then cross-checking with the views of community members. The essential points are given below.

Stage 1. Total dependence (child under two years old): characterized by nursing and weaning.

Also during this nursing period, infants need constant care and are attached to their mothers for the majority of the time. Consequently, a mother is assigned few other responsibilities; feeding is conducted “on demand” and is not rigid in terms of time or quantity.

In most Thai villages, breast-feeding is the norm, generally from birth up to two years in some cases. However, when the mother is the family’s main economic provider (which is common since male migration for work is high), supplementary feeding with formulas or other less nutritious milk substitutes (e.g., sweetened condensed milk) is started as early as one month after birth. Increased episodes of diarrhoea and other infections have been noted during this stage and the next, often when the breast milk substitute is incorrectly prepared or administered. Moreover, an alternative child carer has to assume the mother’s role when the latter returns to work. Such carers include the grandmother or other relative, an elder sibling, or, in the case of community day care centres, other community members. The amount and quality of time allotted by these persons to the child, as well as their health and nutrition knowledge, varies.

Weaning usually begins from one to two years after birth, although the introduction of solid food (e.g., puréed rice and banana) can start within a week after birth. Emphasis is placed on quickly incorporating the child into the family’s diet.

Stage 2. Semi-dependence (child from two to four years old): characterized by a slackening of supervision by the mother or carer. As the child grows older, the closeness with the mother lessens as she resumes her other activities. This maternal separation could make the child vulnerable to disturbances, both physical and mental (including malnutrition). At this age especially, children learn to eat by themselves and to

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Both during and after pregnancy, a mother must follow a number of food restrictions, since certain foods are believed to lower the quality and/or quantity of breast milk.
share the family's normal diet. However, their food consumption is not monitored and the meals are irregular and not varied in content. Toilet training also begins at two to three years of age and is reinforced by the need to leave the child at a community day care centre.

Stage 3. Almost total independence (child about four years old): characterized by being able to do things by him/herself and to be assigned certain responsibilities, including caring for younger siblings with or without adult supervision.

These three stages help community members to assess child growth and development on the basis of food habits and other aspects of socialization that are learned and enforced. The basic assumption is that the child must learn as quickly as possible to cope with the real world, rather than be exposed to prolonged parental dependence and lack of responsibility (“childhood” in the Western sense).

Community model for diagnosing malnutrition

Using the above model, rural community members recognize normal growth and development by comparing one child’s physical and psychological development with that of his/her peers. They can recognize an “average” growth pattern, while noting that some children may grow and learn faster or slower than others. But children who consistently fall below the community norm are of most concern to community members who ask themselves: What is the nature of the child’s problem? Why has it affected him/her? Why now? What course will it follow and what action is needed? How does it reflect on the family and community?

While community members may learn about the etiology of malnutrition from community health workers, they do not immediately see that undernourishment may have been the main cause of retarded growth. Rather, they find other reasons to explain why some children in the community may be smaller than others. The figure overleaf presents the model, with its five steps, which community members use for diagnosing malnutrition and identifying the factors to help control it among children aged two to four years. Without the need for growth monitoring, they attribute a small child’s physical state to genetic factors, poor child caring, e.g., in matters of food selection and preparation, or the child’s eating habits. The mother’s health during and after pregnancy is also considered because problems before and during delivery are potential causes for a child’s slow growth or nutritional deficiency; the latter could be due to inferior breast milk or substitutes during the first stage.

However, if a small child’s personality and development appear normal, the child is not considered malnourished. If the opposite is true, community members recognize there is a problem and attribute it to the child not getting enough food; the village health workers are then consulted about what should be done to treat the child.
A lay model for malnutrition in Thailand

**Rural community members ask themselves:**

1. Is the child SMALL or LARGE as compared to others of the same age?
   - **No problem**

2. Are the child's parents SMALL or LARGE?
   - **Cause: genetic**

3. Is the child experiencing GOOD or BAD child-rearing practices?
   - **Cause: lack of time; poor care by alternative child carer including poor nutrition**

4. Did the mother experience health problems during pregnancy?
   - **YES**
     - **Cause of lack of growth**
   - **NO**
     - **Possible causes: breast milk or milk substitute was inferior in nutritional quality and/or quantity**

5. If no possible causes are noted in 4 and the child is small, what is the child's personality?
   - **Active, happy, rarely sick, not fussy, eats well, sleeps well**
   - **Inactive, unhappy, often sick, fussy, does not eat, does not sleep well**

   - **HEALTHY CHILD**
   - **UNHEALTHY CHILD – MALNOURISHED**
Implementation

Family-based focus

Child health development programmes are usually planned and implemented by professionals who assume that children under five years require constant, specialized care. Specific activities and responsibilities (e.g., growth monitoring, food supplementation) are aimed at either the mother as the primary child carer or the community for larger integrated activities that may be required. However, the child growth and development model used by the rural community members is based on the view that children should become independent and responsible contributors to the family at a very early age. Moreover, others in the family or community are often the main child carers (2).

What can be done to resolve this conflict between the professionals and the community model? Health is mainly determined in the home, where all family members live and work. Their interaction is a process of coordinated behaviours which influence the acceptance and modification of new practices. One short example will illustrate this case. Coupons are distributed by community health workers to the parents of malnourished rural Thai children, and these can be redeemed for supplementary foods (e.g., eggs, milk) at a local health station. Parents often comply but use these foods for the whole family and not the malnourished child alone. The cost in time, energy and fuel to prepare special meals for a malnourished child and the regular family meals is beyond the capacity of most households. It is therefore more economical to use the supplementary foods to feed the entire family, instead of one individual.

The malnutrition problem is thus focused on the family and not on individuals or communities. In the programme’s implementation, changes can be more effectively introduced into the family’s diet—in food preparation and consumption patterns. The target group for child health and nutrition education thus shifts from the child to the family and the role of the child carer.

Community-based problem identification and intervention

The children of mothers who leave home for agricultural work are most vulnerable to malnutrition and poor health status (5), because the child carer is often an elderly family member with inappropriate food beliefs and lack of awareness about the importance of food in disease prevention.

This absence of maternal care contributes to inadequate growth and development of the child because of poor nutrition or malnutrition. Programme planners therefore usually implement interventions that address the malnutrition and not other community-perceived needs, such as inadequate child caring. The real solution to the problem

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rests on providing easily understandable information on proper childrearing, including suitable caring procedures for good health, and promoting new practices and behaviours to eliminate malnutrition and other dietary disorders.
Unlike models used by nutrition educators, e.g., for infant feeding (breast-feeding or formula-feeding), the community members’ models predominantly focus on the successive steps in conducting the proposed new activity in order to achieve a desired outcome, which may not be child health in the nutrition educator’s sense; for the child carer it may be the immediate fulfilment of a child’s hunger.

In rural Thailand, for instance, women begin breast-feeding during Stage 1 of the above child development model, but if they are the major economic provider, breast-feeding for long periods of time is costly and impractical. Hence, not infrequently an alternative child carer is designated and a substitute for breast milk utilized, e.g., sweetened condensed milk which appears to satisfy the child’s hunger for a longer period of time, thus allowing the carer to complete other household tasks; it is also less expensive than formula and very easy to prepare. On the other hand, use of powdered milk substitutes requires several procedures, e.g., identifying an appropriate vessel, ensuring that it is clean, reading directions to determine the proportions of milk to water (which may be impossible for illiterate persons), filling the vessel with water (which may be difficult to obtain in dry periods, and may require boiling), adding the powder in the right proportion using a clean measuring utensil, adding nothing else to the bottle, stirring or shaking, testing the temperature and making adjustments.

Thus, what at first may seem a simple new practice to control malnutrition (e.g., using formula and free supplementary foods) often turns out to be a complex set of behaviours made up of many separate steps—some of which may require new skills or impose costs to the individual. New knowledge, skills and materials must therefore be provided to assist carers in overcoming perceived obstacles, and thus expedite the adoption of a new behaviour.

**References**


