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PROJECT PROPOSAL: NUTRITION/HEALTH EDUCATION IN TUNIS SUD

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Operational Program Grant (OPG) Proposal Outline

Project Title: Nutrition/Health Education in Tunis Sud

Total OPG Request: $46,646

Project Location: TUNISIA

PVO Name and Location: CARE/MEDICO
18, Avenue Docteur Conseil
Tunis, TUNISIA

Central Headquarters: CARE INC., 660 First Ave., New York, N.Y. 10016, U.S.A.

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Date of Submission to A.I.D.: May 9, 1975

I. PROJECT PURPOSE AND DESCRIPTION

A. Description of Project purpose and target group of beneficiaries

1. Project Purpose: To promote an increase in awareness and application of nutrition and health concepts among mothers and adolescent girls (future mothers) in the Gouvernorat of Tunis Sud (equivalent to a state or province).

2. Target group of beneficiaries: This project proposes to reach 5,000 families, or a total of 36,000 persons. This accounts for 17.5% of the gouvernorat's population.

A closer examination of this region reveals that it is primarily rural (85% of the populace) with a small degree of urbanization. The total population has a relatively equal distribution according to sex:

Male:	102,500	
Female:	102,800	
Total:	205,300	(1973)

There are 45,900 women in the childbearing years, which represents 22.4% of the governorat's total population, or 44.6% of the governorat's female population.

The recorded births in this Gouvernorat for 1971 numbered 5,317, meaning that 11.6% of the childbearing age population gave birth in that year. The reported births for 1972 were 6,855.

B. General Description of the Project:

The broader objective to which this project contributes is one defined by the Government of Tunisia (GOT): to improve the nutrition of the population particularly among women in the childbearing years and children in the first years of life. This objective, when examined, presents a logical means of combatting unnecessary maternal and child death, increased morbidity, and decreased productivity on the part of the population.

"Inadequate nutrition" is associated with suboptimal living and leads to a chain of events that has been described as: deficient nutrition—lowered energy output— lowered production— bare subsistence income— meager education— decreased resistance to disease— high death rates in children— lower life expectancy." 1

For the children from birth to 4 years of age, under and malnutrition has the most deadly effects. For example, acute diarrhea can be a dangerous illness for any well-nourished infant, but for a weaned infant in a less developed area, who is consuming a grossly inadequate diet, it can hasten the appearance of Kwashiorkor, bringing with it an appallingly high rate of mortality. To these undernourished children the common infectious diseases of childhood are catastrophic.

Therefore, it could be posited that, excluding such unforseen circumstances as an outbreak of cholera, congenital malabsorption syndromes, etc., that an increase in the nutrition and health status of a population, particularly women of childbearing age and children in the first years of life, would bring about a decrease in infant and early childhood mortality and morbidity.

The following are pertinent public health statistics for Tunisia for 1971. Special emphasis is given here to those statistics dealing with children from birth to four years of age.

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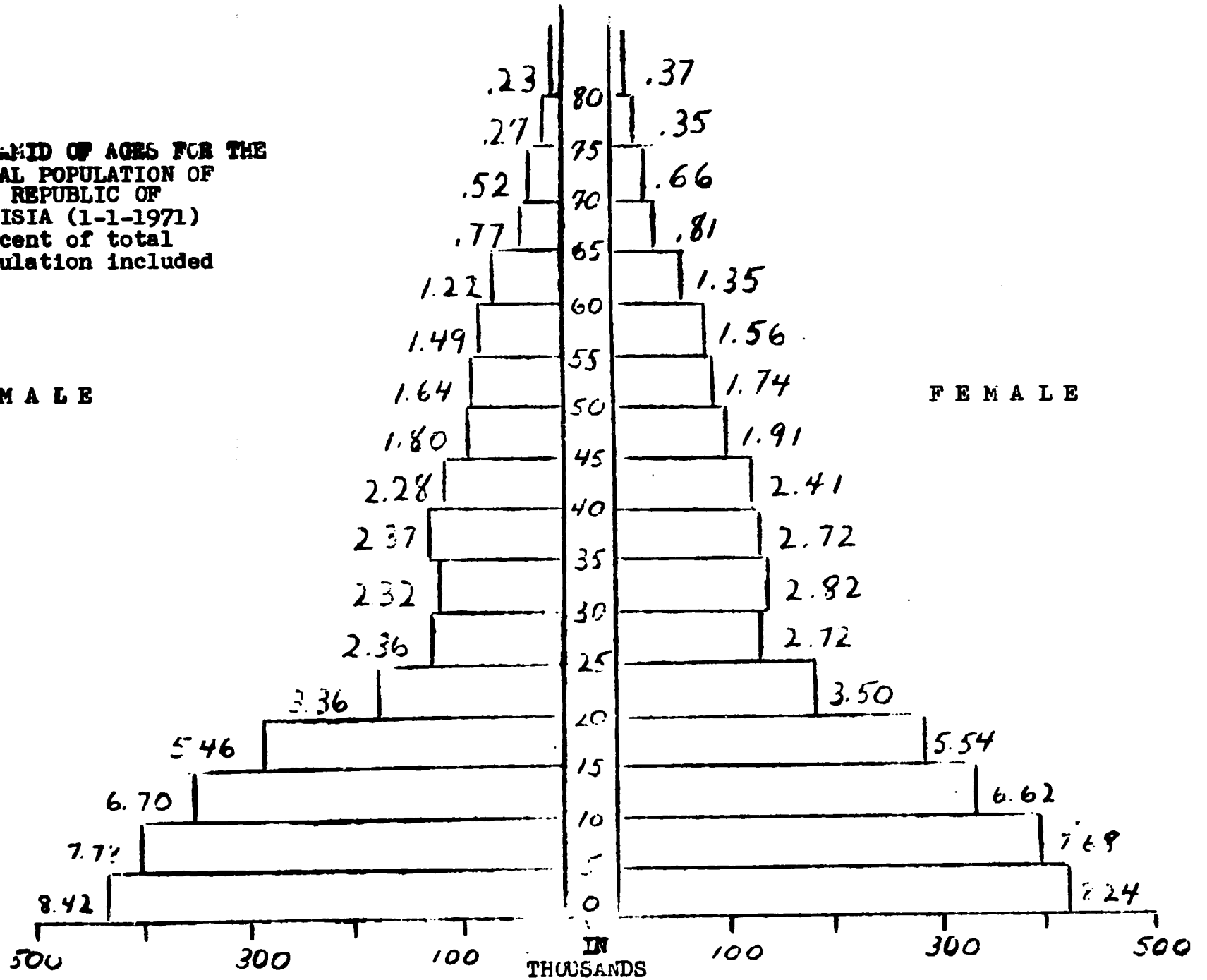
1 President's Science Advisory Committee Report. The World Food Problem, Vol. II, The White House, May 1967

POPULATION DISTRIBUTION BY AGE AND SEX (1971) - in thousands

SEX - AGE	MALE	% OF TOTAL POP	FEMALE	% OF TOTAL POP	TOTAL	% OF TOTAL POP
0-4	436	8.42	427	8.24	863	16.66
5-9	403	7.78	398	7.68	801	15.46
10-14	347	6.70	343	6.62	690	13.32
15-19	283	5.46	287	5.54	570	11.00
20-24	174	3.36	181	3.50	355	6.86
25-29	122	2.36	141	2.72	263	5.08
30-34	120	2.32	146	2.82	266	5.14
35-39	123	2.37	141	2.72	264	5.09
40-44	118	2.28	125	2.41	243	4.69
45-49	93	1.80	99	1.91	192	3.71
50-54	85	1.64	90	1.74	175	3.38
55-59	77	1.49	81	1.56	158	3.05
60-64	63	1.22	70	1.35	133	2.57
65-69	40	.77	42	.81	82	1.58
70-74	27	.52	34	.66	61	1.18
75-79	14	.27	18	.35	32	.62
80+1+	12	.23	19	.37	31	.60

TOTAL POPULATION OF THE REPUBLIC OF TUNISIA : 5,179,000

PYRAMID OF AGES FOR THE TOTAL POPULATION OF THE REPUBLIC OF TUNISIA (1-1-1971) percent of total population included



REPUBLIC OF TUNISIA: CAUSES OF REPORTED DEATH BY FREQUENCY

CAUSE OF DEATH	# OF CASES	CASES/100,000
Congenital malformation	4,289	82.8
Cardiopathies	1,646	31.7
Senility and undetermined causes	1,538	29.6
Broncho-pneumonia (Other than TB and measles)	647	12.4
Accidental death	612	11.8
Tumors	529	10.2
Cerebral vascular accidents	484	9.3
Gastro-enteritis	444	8.5
Respiratory TB	398	7.7
Nephritis	328	6.3
Measles	252	4.9
Bronchitis	252	4.9
Diabitis	224	4.3
Meningitis	184	3.5
Cirrhosis of the liver	148	2.8

LIMITATIONS OF THE STATISTICAL DECLARATIONS

Reported deaths cover only a part of the real death rate and are estimated to be only 73% of the total.

DECLARATIONS ACCORDING TO MILIEU

Urban: 87% of the deaths are reported
Rural: 64% of the deaths are reported

DECLARATIONS ACCORDING TO SEX

Male : 76%
Female: 71%

DECLARATIONS ACCORDING TO AGE

Under one year: 66% reported
41% of the total non-declared deaths are thought to be under the age of one year,

50% under the age of 5 years or 9% of the total non-declared deaths, are between the ages of 1 and 5 years.

Total Reported Deaths under 1 year : 4,604 (1971)

Estimated Real Deaths under 1 year: 7,803

This above figure indicates an estimated infant mortality rate of 42.7/1,000 based on 182,749 births in 1971.

CAUSE OF DEATH	TOTAL REPORTED CASES	UNDER 1 YEAR		1-4 YEAR		COMBINED: 0-4 YEARS	
		# CASES	% OF TOTAL	# CASES	% OF TOTAL	# CASES	% OF TOTAL
1. Congenital Malformations	4,289	3,302	76.99	78[illegible]	18.21	4,083	95.20
2. Pneumo & Broncho pneumonias	1,045	479	45.85	284	27.19	763	76.04
3. Infectious disease other than TB and measles	647	284	43.93	156	24.08	440	68.01
4. Accidental death	612	---	---	66	10.73	66	10.73
5. Measles	252	92	36.56	143	56.79	235	93.35
6. Gastro-enteritis	444	275	61.98	81	18.26	356	80.24
7. Bronchitis	252	105	41.67	64	25.36	169	67.03
8. Meningitis	184	67	36.52	41	22.47	108	60.00

DISTRIBUTION OF CAUSE OF DEATH FOR CHILDREN UNDER ONE YEAR (1971)

CAUSE OF DEATH	TOTAL FOR POPULATION	TOTAL UNDER 1 YEAR	% OF TOTAL	UNDER 1 WEEK		1 WK. - 1 MO.		1 - 3 MO.		3 - 6 MO.		6 - 12 MO.	
				#	%	#	%	#	%	#	%	#	%
1) Congenital malformations	4,289	3,302	76.99	1,092	33.06	638	19.32	401	12.14	535	16.20	636	19.28
2) Pneumo & broncho pneumonias	1,045	479	45.85	31	6.38	73	15.16	112	23.40	113	23.68	150	31.38
3) Infecticus diseases other than TB and measles	647	284	43.93	31	10.96	44	15.35	42	14.91	72	25.44	95	33.34
4) Measles	252	92	36.56	--	--	--	--	3	3.79	17	18.18	72	78.03
5) Gastro-enteritis	444	275	61.98	24	8.70	39	14.01	40	14.49	78	28.50	94	34.30
6) Bronchitis	252	105	41.67	10	9.56	14	13.04	30	29.57	26	24.35	25	23.48
7) Meningitis	184	67	36.52	5	7.69	7	10.77	15	21.54	11	16.92	29	43.08

It is outside the scope of this proposed project to improve the nutrition and health of the entire nation. The project does, however, propose to introduce a mode of improving nutrition and health and testing it in one area of the country.

Although any change in nutritional status would probably be negligible when looking at the country as a whole, results may well be expected in the project implementation area. Therefore, there will be a comparison made of the incidence of mortality and morbidity before and after implementation in the project area to determine whether this program is in fact contributing to the higher stated goal of the GOT.

Exacting health statistics on the Gouvernorat of Tunis Sud are not presently available. However, the Tunisian National Nutrition Survey has already collected data from this area, which has just recently been sent to the WHO Headquarters in Geneva, for analysis. Every effort will be made to have these results available to CARE. Such information will permit us to better pinpoint those areas most in need of nutrition/health education in the Gouvernorat.

This project will be implemented in the rural area of Tunis Sud, through a community nutrition and health education program teaching the following concepts:

1) The importance of good nutrition for optimal growth, development, health and intelligence of the child; the inter-relationship of nutrition to child spacing to benefit the health of the mother, fetus and the newborn.

2) The principles and importance of breastfeeding.

3) The importance of including ~~supplementary foods~~ in the child's diet from the age of 6 months; how to prepare such foods from local ingredients.

4) The importance of good nutrition during pregnancy and lactation.

5) Encouraging the use of local foods rich in protein, calcium, riboflavin, and iron.

6) The importance of good food habits for the whole family and the rational use of the family budget; the concept of a balanced meal.

7) Important notions of child care:

a. the importance of immunizations
b. diet during illness
c. food hygiene and its relation to gastroenteritis
d. effect of the sun in the prevention of rickets
e. detection of the first symtoms of under and malnutrition.

The purpose of this education is not merely to teach such concepts; it is to mativate the women to put this new knowledge to regular use in their own homes.

The nutrition/health concepts will be taught to the women by Tunisian health and social personnel who will be given a special one month seminar in applied nutrition. This particular aspect of the project will be discussed in greater detail under Part III.: Project Analysis, C.

C. Conditions Expected at End of Project:

1. Increase in the number of children immunized: This particular goal applies specifically to 4 of the 15 centers in this project. These are the 4 maternal-child health centers (MCH's) for the Gouvernorat. In these centers, reporting procedures for immunizations, is at best, sporadic. However, this project will not only seek to increase the number of children immunized but also to improve the recording procedures for each of the centers.

2. An increase in the number of children who adhere to a smooth and consistent growth curve and who maintain a healthy size-for-age arm circumference. For the purpose of this project, a french version of "the Under Fives Clinic" chart will be used as designed by Maurice H. King, M.D. (See Appendix for an illustration of this chart).

Two "control" MCH's will be used to serve as a comparison before and after the in-center project. In these centers, 100 children (total) will have their weights and arm circumference and heights taken before the project begins as well as those children in participating centers. Measurements will be taken at the 6th month mark of the in-center project and again at the end of the project on the control group. Immunization information will also be taken at these times. A comparison of the participating children and the control group will be made at the end of the project to determine the effect of the nutrition/health education.

3. Increased application of principles of breastfeeding

4. Changes in food spending habits in favor of foods high in protein, vitamins and minerals.

As behavioral changes such as (3) and (4) above to quantify and verify directly, indirect means must be used. Questionnaires (to be later explained) will be used.

II. PROJECT BACKGROUND

A. History of proposal development:

CARE's interest in nutrition/health education developed in 1973, when its Division of Applied Nutrition began to research the field for existing programs and to discuss plans with the National Institute of Nutrition and Food Technology.

CARE was interested in implementing the project in the Governorate of El Kef, at that time, for several reasons: El Kef is an agricultural region in the interior populated by poor, isolated, overlooked families deemed in need of almost everything. CARE was directing a water wells reconstruction project in the Governorate in cooperation with the Regional Public Health Administration and had thus created a reputation for itself and established good relations with local administrators. In the course of investigations, CARE learned about a Dutch Medical Team in El Kef which had already introduced some nutrition/health education activity in the local MCH centers, and planned to expand this activity with the help of young Tunisian social workers. Although it was originally felt that their efforts and CARE's would be complementary, it became apparent that the proposed project would duplicate to a large extent the on-going efforts of the Dutch team. Furthermore it was realized that we would be competing for limited available personnel and that it would be difficult to distinguish the results of CARE's project from the results of the existing project for evaluation purposes. It would also have been inconvenient to implement a pilot project that far away from CARE headquarters and the National Institute of Nutrition in Tunis.

CARE began to research the possibility of doing the project in the Gouvernorat of Tunis Sud, an area which surrounds but does not include the capital city of Tunis and its suburbs. There are several factors which support the selection of this Gouvernorat for our pilot nutrition/health education project. They are as follows:

a) Tunis Sud is geographically close to Tunis and the collaborating agencies administrating the project (CARE and the NIN), a fact which would contribute to the ease of supervision and thus to the smooth-running of the project.

b) The project would supplement other present efforts in the region by USAID, in the field of population control;

c) The administrators of this Gouvernorat have expressed strong interest in, and have pledged support of this project;

d) Adequate facilities and personnel are available to carry out the project;

e) To CARE's knowledge there is no other previous, on-going, or planned nutrition/health education program designed to reach women in the child-bearing years in this Gouvernorat;

f) The National Nutrition Survey has already collected its data from this area, which will be made available to CARE;

g) Socio-economic data of the area indicate that the majority of the population are rural indigent poor.

B. Prior Experience in project and related areas:

CARE has considerable experience in the administration of nutrition and health programs in Tunisia since its establishment there in 1962. CARE/Tunisia has administered feeding programs for the past 8 years. In 1971 it created a Division of Applied Nutrition for the purpose of improving the use of the PL 480 food commodities distributed to school canteens and MCH centers. This Division has been staffed for the last 4 years by a Tunisian nutritionist employed by the Ministry of Public Health but seconded to CARE. A Peace Corps Volunteer nutritionist has worked together with the Tunisian nutritionist during the past two years to develop the proposed nutrition/health education project and to experiment with and encourage the use of the enriched blended foods among recipient school children, children under 3, and pregnant and lactating women.

Most of the other programs directed by CARE/Tunisia have been in the field of public health. These include a successful ten-year orthopaedic surgery training project and several water wells reconstruction and renovations projects in different regions of the country.

The proposed project for Tunis Sud will be directed by CARE/Tunisia's Associate Director in charge of nutrition programs, who has ten years of administrative and field experience overseas in nutrition and related programs. He was the Administrator of Project POSHAK for CARE in Madhya Pradesh, India from 1970 to 74.

C. Host country activity in project/program areas:

Tunisia, with the help of foreign governments and agencies, has made much progress in developing and implementing plans of action which directly or indirectly affect the nutrition and health of the population. These include agricultural research and extention programs, public health and environmental sanitation programs, population control programs, economic development plans, food distribution programs, and many others. There is also a proposed nutrition planning project between A.I.D. and the GOT, the purpose of which is to assist the GOT to establish a permanent, viable institutional capacity for assessing nutritional needs; planning, coordinating, implementing and evaluating specific policies and programs to meet those needs; and developing realistic national nutritional objectives and strategies for achieving them.

The need for nutrition/health education in particular has been recognized in Tunisia by the Sub-Committee on Nutrition Education which reported:

"Ignorance of basic nutrition guidelines is at the origin of many malnutrition cases. This ignorance, associated with poor utilization of available foods, leads very often to undernutrition. The Sub-Committee on Nutrition Education feels that in the effort to improve nutrition of the population it is fundamental that the population become aware of their nutrition needs and learn practical ways to meet these needs.

The Sub-Committee stresses the need for action in the field of food and nutrition from the combined approach of TEACHING-TRAINING-EDUCATION."

Although the approach to nutrition education has mainly consisted of the formal training of nutritionists and food technologists through the three-year program offered by the Superior School of Nutritional Sciences, some other present efforts in this field have come to CARE's attention. These include the fore-mentioned Dutch project in LeKef, a small but promising local chapter of the La Leche League, and a professional-organization of nutritionists known as the Society of Nutrition and Food Hygiene, whose members organize activities such as weekly radio and TV programs. There are also attempts to introduce nutrition/health education into the elementary school curriculum and to better integrate nutrition into the curricula of the medical school and professional training schools.

A good deal of this activity originates in the Division of Nutrition Education of the NIN. This Division has recently given new interpretation, emphasis, and direction to nutrition education for Tunisia. The need for informal popular education stressing mothers and future mothers as the priority target group has been asserted and a variety of methods outlined for integrating this into the existing local institutions. Some of these include the following:

a) Through the Health Sector...

1. increase and improve education seances in MCH centers.

2. integrate nutrition education with post-partum education.

3. envision eventual cooperation with private sectors (Doctors, nurses, pharmacies, laboratories)

b) Through the Social Sector...

1. increase education in nutrition in the "Social Action Centers"

2. cooperate with administrators for the planning of health and nutrition education in:

- Rural Centers for Young Girls
- Alphabetisation Centers
- Youth Organizations

3. envision an educational program for mothers with children in nursery schools

c) Through the Education Sector...

1. cooperate with the National Education and UNICEF on nutrition education programs in primary schools

2. envision integrating nutrition education in secondary schools

d) Through Mass Communications...

1. increase the supply of educational materials (brochures, posters, manuals, slides, films, etc.)

2. increase nutrition messages, programs and articles in the mass media

e) Through Training Schools...

1. integrate nutrition and methods of teaching nutrition into the school curricula for medical and paramedical personnel, social personnel, teachers, etc.

2. recycle these cadres when necessary

CARE has discussed these possibilities with this Division of Nutrition Education, and has attempted to develop a project consistent with their priorities and goals.

III. PROJECT ANALYSIS

A. Economic effects of the project

Countries where malnutrition and high infant mortality and morbidity are known to exist cannot afford to wait passively until the economic growth and development of the country begin to relieve the situation. Indeed, the economic development of the country is hindered to the extent that malnutrition, high infant mortality, and high infant morbidity persist. These conditions involve considerable costs, both direct and hidden. The direct costs of medicines, disease epidemics, hospitalization, rehabilitation are high and often without apparent end or effect. However, there are many other costs of a peasant family that are responsible for perhaps an even greater drain on a nation's economy: the work days lost due to decreased resistance of people to illness and disease; lowered life expectancy; lowered energy output and the resulting decrease in production and income; the opportunity cost of women's time spent in tending the sick and waiting in clinics. And no amount of money can measure the anguish and despair prevelent under such conditions.

Numerous conferences and reports in recent years have discussed malnutrition as a socio-econimic factor in developing countries and have debated the relative costs and benefits of different approaches to it. It is now believed that the emphasis of a developing country's health program should be on preventive medicine and public health measures. A preventive health system emphasizing immunization, environmental sanitation, education for improved child care and nutrition, etc., is less expensive and has far more effect on the health of most of the people than a curative one. "It costs as much to rehabilitate one case of acute malnutrition (marasmus or kwashiorkor) as it does to enrich the diet of several hundred children, over the same period of time. This does not take into account the fact that irreversible damage may have been done."* It is understood that limited resources will and must be first put toward the urgent and immediate realities of healing the sick, but a vicious cycle is perpetuated unless some preventive action is taken simultaneously, because the 'healed' fall sick again. In the long-run, some monies diverted to preventive measures will have a more lasting impact.

Below is a breakdown of US AID funding in relation to the target population. It is evident that this project has the potential to reach a significant number of people at low per capita cost.

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* Handbook on Basic Nutrition for CARE Overseas Representatives, Program Department Technical Services, CARE, Inc., 660 First Av., New York, N.Y. 10016, 1969.

Targets Contacts	5,000 mothers and adolescent girls
Size of an average Tunisian family	7.2 persons
Total Target Population	36,000 persons
Total Funds requested from US AID.....	$46,646.00
Cost/beneficiary for life of project.....	1.29
Cost/family for life of project.....	9.32
Cost/beneficiary/month....	.047
Cost/beneficiary/year.....	.056
Cost/family/year.....	4.83

What this table does not show is that the target population and more will continue to benefit in future years from the knowledge disseminated by this project, nor can we measure this since it is indeed a long-term investment yielding compound interest.

As stated in the Logical Framework Matrix, the overall goal to which this project aspires is to improve the nutrition and health of the target population. This will contribute to increased resistance to disease, increased longevity, and decreased infant and early childhood mortality and morbidity among the target population. This should have long range effects on increasing productivity through more effective man-hour functionning, thereby increasing income. The education of the target group will also have a strong impact on socio-cultural traditions and values, which will be discussed in Section III. C.

This project has a potential effect on local markets. If the education produces the desired impact, changes in food spending habits should occur, and this should be reflected in the marketplace. A food consumption survey conducted by the National Institute of Statistics on 7,150 households from 1965 to 1968 * found, for example that the "average" person in Tunisia spent $ 178.50 per year, of which $90.00, or 50.3% was spent on food. This is approximately $ $7.50 /month / person. (In large towns, the percent of an individual's expendable income allocated for food was 42%; in villages 50.7%; and in sparsely-populated countryside, 57.3%). The average individual spent his food budget in the following manner:

3.5% on milk and milk products
6.5% on tea, coffee, and drinks
4.9% on sugar
10.5% on oil
1.1% on eggs
2.1% on fish
4.3% on fruits
9 % on vegetables
2.2% on legumes
32 % on cereals
14.6% on meat and poultry

Ten percent of the total yearly expense for meat was spent during the Islamic feast "AID EL KEBIR" alone. The average per capita consumption of eggs per year was 38, but urban areas consumed twice as much as rural areas (60 eggs compared to 30). The average per capita consumption of milk per year was 21 liters. (25.1 in cities, 11.1 in villages, and 22.1 in the countryside.).

When half of the expendable income is spent on food, and is allocated in the foregoing manner, there is a strong argument for a program which gives appropriate education to the consumer.

As purchasing power begins to increase, education must help guide and moderate the accompanying changes in consumer behavior.

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* "La Consommation et les Depenses des Menages en Tunisie, 1965-1968", Institut National de la Statistique, December 1968, Tunis.

(It should be noted that this survey is now being updated, and the results should be available in December, 1975.).

Studies of sales in the marketplaces might reveal an increase in the demand for foods which were formerly less demanded, such as eggs, fish, legumes, and milk and a corresponding decrease in sales of, say, oil. This would influence local supply and prices. The project thus begins to effect the commercial sector and the agricultural sector. An increased demand for some foods and the accompanying rise in prices could possibly become a motivating factor in the practice of home gardening and raising poultry.

B. Technology to be used and its appropriateness:

This project has been carefully planned so as to keep the scope and technology involved in accomplishing our objectives within the resources and abilities of CARE and the cooperating host country agencies. Administratively, it is within the capabilities of CARE, given the considerable previous overseas experience of CARE/Tunisia staff in the administration of nutrition and health related programs: The appropriate training and experience of the other project personnel will also contribute to the successful implementation of the project. (Please refer to the staffing pattern in Appendix D.). The Division of Nutrition Education of the National Institute of Nutrition is a capable and strongly-committed host country counterpart agency, suitably-oriented and staffed to collaborate on this project and to coordinate future efforts expanding from this project. It is important to note that the emphasis of the project is on developing available resources within existing infrastructure. The project purpose, "to promote an increase in awareness and application of nutrition and health concepts among mothers and adolescent girls in Tunis Sud", shall be accomplished in essentially two steps:

1) train 30 existing Tunisian health and social personnel to increase their knowledge of nutrition and health concepts and their effectiveness in teaching it;

2) and integrate nutrition and health education activities in 15 existing rural community health and social centers in Tunis Sud, utilizing the trained personnel.

The training seminar, first of all, will be jointly organized and conducted by CARE and the NIN. Thirty Tunisian social workers (Animatrices Sociales and Assistants Sociaux) and paramedical personnel (Aides Soignantes) currently working in Tunis Sud will attend the seminar. The selection of these young women will be made by the Regional Administrators of Public Health and Social Affairs, the Midwife Supervisor of Tunis Sud, and CARE project personnel. Their selection will be based on observations, interviews, and their supervisors' evaluations of their work in terms of motivation, dedication, and competence. These girls are deemed an appropriate and valuable resource in the communication of nutrition and health principles in rural communities by dint of their training and on-the-job experience, which are explained in Appendix A.

There are sufficient social workers and paramedical personnel in Tunis Sud to assume the responsability of teaching nutrition and health as proposed in this project. These personnel and their sites of work are listed in the tables in Appendix B.

The information presented during the training seminar will be kept purposely simple and practical in both its content and presentation. Members of the NIN faculty, CARE project personnel, and guest lecturers will all help conduct the seminar sessions. The seminar will consist of lectures, informal discussion groups, and practice sessions teaching:

a. practical information on the subjects previously listed in section I.

b. audio-visual teaching methods and techniques for effective communication,

c. how to take anthropometric measurements of children,and

d. how to use and interpret growth charts.

Although lectures will usually be given in French, the informal discussion groups and practice teaching sessions will be conducted in Arabic. The seminar is intended to motivate the participants as well as teach them. It will be offered during two time blocks of one to two weeks each, with half the trainees each time. The advantages of this are that we avoid creating a critical manpower drain in the governorat, and can work with smaller groups, thereby increasing the potential effectiveness of the seminar. It is felt that the alloted time is sufficient for the participants to assimilate the additional knowledge and master the techniques for its effective teaching.

CARE project personnel and their counterparts at the NIN will jointly develop educational aids to be used in both the training seminar and the educational sessions in community centers. This will include a well-illustrated methods and technique manual, flannel-boards, posters, and a series of slides and recorded nutrition lessons. Most of these materials will be produced locally and will be carefully adapted so as to be applicable and understood by the target population. The growth charts used in the project will be simple to use and understand.

Through the use of the newly trained personnel, nutrition and health education activities will be integrated into the programs of 15 community centers in various villages in Tunis Sud. Four kinds of centers have been selected as appropriate places to reach the target population. These are MCH Centers, "Social Development Centers", "Social Action Centers", and "Rural Centers for Young Girls".

The MCH Centers:

There are four such centers in the Gouvernorat of Tunis Sud. Typical services include pediatric consultations two days a week and gynocological consultations one day. The MCH Centers are ideal for furthering nutrition and health education for several reasons:

1) mothers must often wait several hours with their children before seeing the physician. This waiting period could be utilized by the center personnel for the informal nutrition/health education sessions.

2) it permits integration of nutrition into the presently existing system of health services, particularly family planning. There is strong evidence that "increased infant and preschool child mortality is incompatible with family planning because few parents in developing countries want to risk not having children to support them in their old age. Therefore, improved nutrition and other preventive measures, i.e. immunizations, are the best way to decrease mortality, and therefore promote family planning".[1]

3) the center is the best place to monitor the child's growth and development and nutritional status.

4) these serve as the centers of distribution for WSB in CARE's preschool feeding program. The WSB distribution is attracting more mothers to the center than prior to distribution and continuation of this practice may well serve as an incentive to attend the informal nutrition/health education sessions. (although WSB is distributed and its use and preparation explained, emphasis during the educational sessions will be on preparation of local foods).

The Social Development Centers and Social Action Centers:

There is such a center in most communities. A variety of women's activities are conducted in these centers, including adult education, handicrafts, social work, etc., which are led by social workers. The center is also the operational base for rural extention to homes; the social workers regularly visit homes in their assigned sector, usually on three days a week. The centers are thus predisposed by the nature of their existing activities, audience, and staff, to serve as nutrition and health information centers.

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1 : Nevin S. Scrimshaw. "Myths and Realities in International Health Planning," American Journal of Public Health, volume 64, No. 8, Page 795.

Rural Centers for Young Girls:

These are centers for girls in their pre-teens and teens who have attended school or who do not continue their formal education beyond primary school. They learn sewing, knitting, embroidery, cooking, gardening, and other domestic arts as well as reading, writing, and health. There is one such center per gouvernorat.

The Rural Centers for Young Girls provide a "captive audience" for the young girls living at the centers throughout the nine-month program. The importance of reaching this particular segment of the population rests in the fact that these girls themselves will one day be mothers. Therefore, nutrition and health knowledge relative to themselves and their families at present, as well as anticipatory guidance relative to the children they will bear is of paramount importance.

The final selection of the specific 15 centers in which nutrition/health education will be integrated into the program of activities will be made according to the adequacy of physical space and facilities and availability of personnel.

There will be approximately two trained girls in each center. Upon completion of the seminar, the girls will return to their respective centers, where they will organize and conduct classes, and teach nutrition/health during their home visits in the community. CARE project personnel will assist the trained health and social personnel to establish nutrition/health education activities in designated areas in each center. The following materials and equipment will be supplied: benches, tables, a scale, demonstrations materials, cooking apparatus, utensils, storage cabinet, cooking fuel, foods to be used for demonstrations, cleaning items, growth charts, tape measures.

In each center the schedule of educational sessions will be determined based on the days and times most conducive to attendance by the target population (for example: "souk" (market) days are inopportune for such sessions.) Through contacts with the local delegate as well as through influential and respected townspeople, public awareness and interest in the new center activities will be generated.

Educational sessions will be held on a regular basis. The health and social personnel will conduct these activities under the supervision and periodic evaluation of CARE project personnel.

The message to the target population and the methods of communicating it are to be kept simple and appropriate to their level of living.

The educational sessions will be characterized by:

1. small, informal group discussions

2. encouragement of questions on the part of mothers and young girls

3. the stressing of one simple theme per session (refer to Section I).

4. continual use of audio-visual materials, i.e. flannel-boards, posters and pictures.

5. demonstrations by the health and social personnel with return demonstrations of the same by the mothers and young girls

6. explanations with persuasive emotional appeal

The integration of nutrition/health education activities into the rural community centers will be achieved when:

a. the centers are equipped and educational activities scheduled in the centers's programs;

b. the trained personnel are conducting the activities in the centers and during home visits; and

c. the extention manual and educational aids are created and in effective, regular use.

This is obviously not a research project; however, we are faced with the task of evaluating the impact of nutrition/health education on the target population. This task is a complicated one since the anticipated changes are to a large extent behavioral in nature. In measuring changes in behavior, as well as the resulting changes in health and nutritional status, we are hindered by the lack of relevant statistics, meaning that we must first compile the necessary baseline data. In this project the host country social and paramedical personnel will be relied upon considerably to assist in this, as well as in maintaining accurate records during the project and in the collection of comparative data at the end of the project. The related methodology is therefore kept intentionally simple.

Possible project constraints

The achievement of the project objectives is contingent upon the stability and validity of several important assumptions which have been made. These assumptions represent potential constraints on the expected outcome of the project. These are listed in the logical framework. None of them can be 100% guaranteed, but they can be continuously monitored as part of the on-going evaluation of the project. In this way, should any problems arise, immediate attention can then be given to rectify the situation.

C. Socio-Cultural Factors

The need for this project and its potential contribution toward improving the nutrition and health of the target population is most vividly viewed when careful analyses are made of various nutrition and health surveys and studies conducted in Tunisia. The National Nutrition Survey has already collected their data from the Gouvernorat of Tunis Sud, which has just recently been sent to the WHO Headquarters in Geneva for analysis. Every effort will be made to have the results made available soon to CARE. Such information will permit CARE and the National Institute of Nutrition to pinpoint the nutritional deficiencies and the areas most in need of nutrition/health education in the Gouvernorat.

We know from the 1968 Food Consumption Survey that nutritional deficiencies are found in Tunisia, the most serious being in calcium and riboflavin, with lesser deficiencies in vitamins C and D and niacin.

Several studies have investigated the causative factors of these deficiencies; these are most often socio-cultural factors including weaning practices, breastfeeding practices, food preferences and prejudices, family eating patterns, lack of awareness of nutrition and health concepts, etc. These are areas where nutrition education intervention is possible and desireable.

The "Yale Project", directed by Dr. H.B. Young in 1972-74 studied nutrition and development of Tunisian children of urban low socio-economic families and dietary practices of pregnant and lactating mothers. Women in three Tunis communities were surveyed by means of household surveys and oral questionnaires. The study found that from 36 to 50% of the women questionned actually ate less during their pregnancies than they normally did. Twenty percent of the lactating mothers questionned drank only one serving of milk a month.

Lactating mothers consumed only 35% of the calcium recommended during this time, and only 50% of the recommended quantity of riboflavin. Thirty percent of mothers did not breastfeed, or stopped before 6 months; 40% of the Medina (central city) mothers breastfeed their children until the age of 1½ years, compared to 70% of the mothers in Saida Manoubia, a community of families more recently arrived from rural areas. Twenty three percent of the women who stopped breastfeeding did so because they have "unsufficient milk", 22% because of another pregnancy, and 20% because of illness. About half of the children 18 months old never or rarely got eggs (one egg or less per month) and about a third never or rarely got meat. It is probable that the prevailing myths about the bad effects of eggs and meat for babies are responsible for this, (for example, the belief that eggs cause stuttering, meat causes stubborness).

A study conducted by Dr. Rejeb in 1967-68 for UNICEF and the Ministry of Public Health also revealed significant information about diets during pregnancy and lactation. In the regions studied - Sfax Beja, and Kasserine and through interviews with women, it was found that 55% of the women did not change their diets during pregnancy. Seventy to ninety-two percent did not increase their food intake during the period of lactation.

Both the Yale study and the UNICEF study indicate that many Tunisian women receive inadequate nutrition during pregnancy and lactation, one reason for this may be that they are not aware that an increase in calories and particular nutrients is necessary. Another factor may be the woman's traditional role in the family which requires that she serve her husband first, her children next, and herself last.

The food consumption survey studied infants under 2 years of age in rural areas (villages and countryside) to establish the composition of infants' diets according to age. It was found that just over half of the children between the ages of 6 and 9 months, the age when supplementary foods should be introduced, ate no supplementary foods in addition to milk. Twenty one percent of the children between the ages of 1 and 1½ years still received no supplementary foods. Fiftenn percent of all children under two did not get any milk at all but only various semisolid foods. Although 39% of the mothers continued to nurse their children until they were 1½ to 2 years old, it is likely that this percentage has since fallen, judging from increasing trend away from breastfeeding in favor of artificial feeding, which is due in part to the persuasive propaganda of companies who market infant formulae.

Health statistics for Tunisian children further illustrate the pressing need for education in hygiene and preventive health measures and their relation to good family health and nutrition. Infant diarrhea and dehydration and the accompanying malnutrition occur with needless frequency, particularly during the summer months. The Manuel De Puériculture, Projet Avicenne, Cooperation Canado-Tunisienne, reports that gastro-enteritis and pneumopathies (combined) account for four/fifths of the deaths of children aged 0-1 year. The estimated infant mortality rate is $2\frac{1}{2}$ times higher in rural areas than in Tunis and its suburbs (200/1000 rural, 80/1000 Tunis), due to the fact that care is more accessible in Tunis, especially in the case of dehydration during epidemics of summer diarrhea. Much evidence has accumulated to indicate that the excess postneonatal mortality among young children in developing countries, as compared with industrialized ones, is almost entirely the result of the synergistic interaction of malnutrition and infection and simplu does not occur if the children are well nourished.* The observance of basic hygiene in the home and improved child feeding practices can be encouraged through community education.

The community [illegible]tion/health education activities may have socio-cultural effects on the community beyond the improvement in nutrition and health practices per se. The community social worker will now be seen as someone knowledgeable in preventive health measures, good diet, etc., and should accordingly acquire additional stature and credibility among the people. This is important because it strenghthens the image and the role of women in a male-dominated society. It will also make her more effective in other aspects of her work - in a family planning campaign - for example. In addition, her advice in preventive health should make people more self-sufficient in observing good health practices at home; they no longer need feel helpless or resort to supersitition in avoiding or confronting minor illnesses. People will come to think of the health center as a well-child center, not a last resort for miracle cures. As fewer people go to MCH Centers and dispensaries for minor illnesses, the heavy case load will be reduced. This will enable the limited numbers of medical and paramedical personnel to provide more thorough, less superficial diagnosis treatment of patients.

This project will thus strengthen local capability to provide services to the people.

On a higher level, the project strengthens the capability of the counterpart agency, the NIN, to contribute to improving the nutrition and health of the population, first of all by providing a means

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* Scrimshaw, op cit, p. 795.

of exchange of knowledge and experience between CARE and the NIN; and second by providing important field training and experience, and establishing a model which can serve as a basis for future efforts in expanding nutrition/health education country wide.

D. Statement of Project relationship to other considerations:

1. Directness of project impact upon people who constitute the povrest majority and are often beyond the reach of public services:

The project's impact upon the poorest majority is best demonstrated by giving a more detailed explanation of the centers where this project will be implemented.

Maternal-child health centers in Tunisia are part of the Division of Preventive Medicine of the Ministry of Public Health and therefore run by the state. This particular division receives only 8 percent of the total ministry budget. Services in these centers are for the most part lacking. However, at these centers no one is turned away and care is free to those who cannot pay.

For those with money, there are private clinics and therefore the maternal-child health center population is one servicing those who have not the money to seek private consultation.

The Social Development Centers and Social Action Centers are presently used for a variety of activities including adult education, social work and handicrafts which are under the direction of social workers and rural extention agents. In addition to conducting center activities, the personnel visit homes on a regular basis. But, as is the case with the MCH's, these centers offer there services, for the most part, to the most economically disadvantaged in the community.

2. Tie in, if any, with other programs which assure complementary efforts (or plans to do so).

In all MCH's throughout Tunisia there presently is an active family planning programme. Also, each center is a distribution point for the PL 480 commodity W.S.B. The actual project will feed into family planning activities here and build up or create the nutrition/health education component in each center.

In the social centers, the nutrition education component is new but will be integrated into the presently existing activities.

3. Potential for project to spread to larger numbers of people over an extended period of time and how this should best come about. Although the target population for the life of this project is 36,000 persons a far reaching effect is foreseen. Upon successful completion of the project the NIN will set up a more far reaching project to encompass all governorates using only domestic resources. (this will be further discussed in Part E.).

E. Presentation of a realistic plan for duplication and institutionalization with domestic resources:

One of the most important aspects of this project is that it does not seek to create a new institution of any kind but rather to build within the presently existing health and social welfare infrastructure.

The NIN was particularly chosen because of its declared commitment to nutrition/health education, its present level of functioning, and for its ability to coordinate the educational activities through two different ministries.

By the end of the project, the 2 project field assistants will be trained in implementing this type of project. As graduates of the NIN School of Nutrition they can then return there and become a vital part of setting up the program on a country-wide basis.

Another important aspect of the project in terms of duplicability is the health and social personnel themselves. The fact that they are presently part of the existing health care delivery system, means that a new type of para-medical need not be trained to serve the purpose.

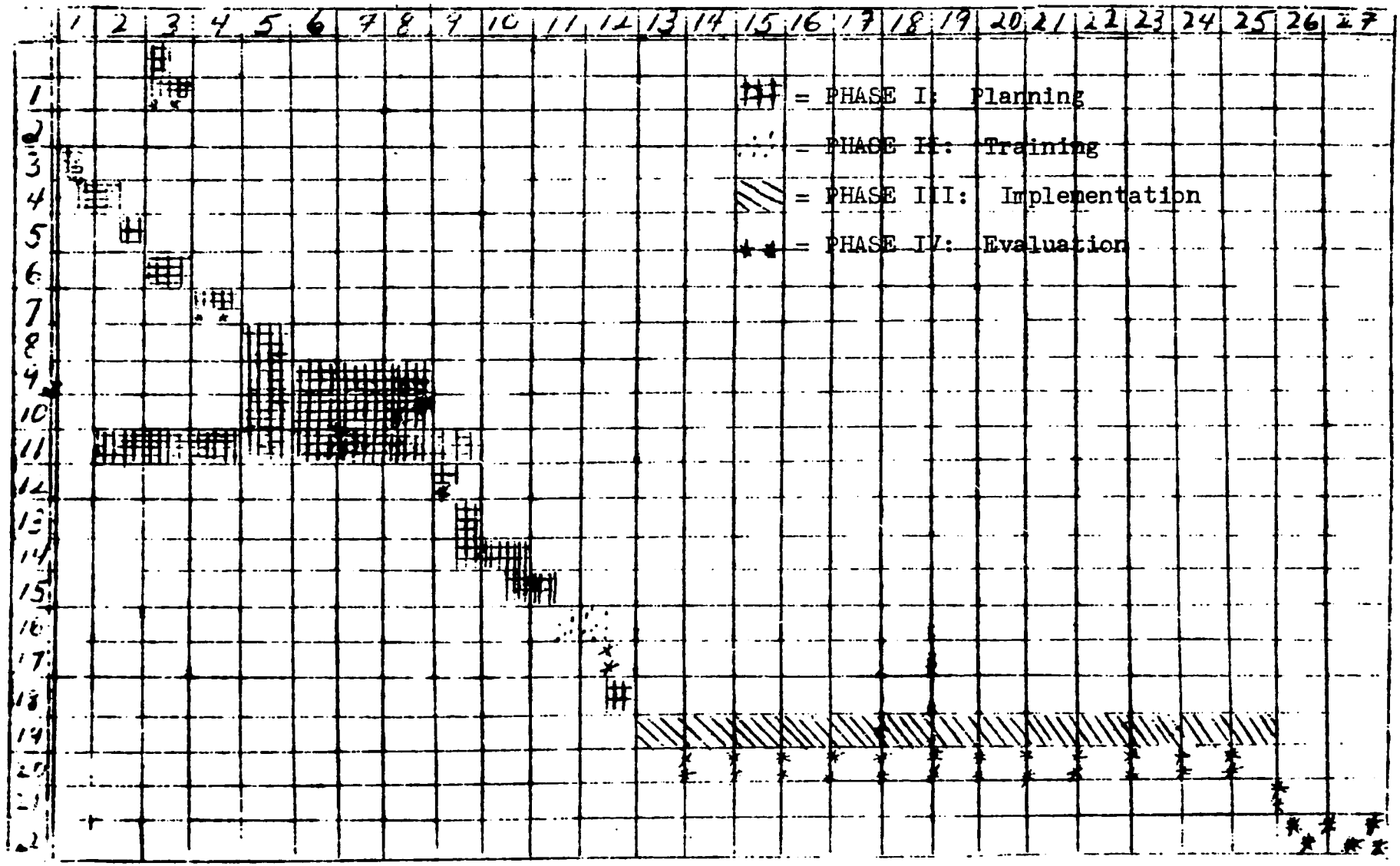
At the present time, the NIN, MOPH, and MOSA are keenly interested in this particular project. Their contributions to this project will include not only their interest but will also be seen in the form of:

1) centers' personnel salaries
2) the centers for the activities
3) the NIN

   a) seminar space
   b) instructions
   c) some visual aid materials

In order to completely finance this type of project, the 3 associated agencies must make the appropriate budgetary requests for the new year, beginning January of each year. CARE expects during the final project months to meet with the NIN to assure that such requests will be made so as to insure implementation of the project on a fuller scale.

MONTHS



** See text for explanation of vertical numbering

IV. PROJECT DESIGN AND IMPLEMENTATION

A. Implementation Plan

1. How project will be carried out.

This project will be carried out under the direct supervision of CARE/MEDICO Tunisia. The host country counterpart agency will be the Tunisian National Institute of Nutrition.

The two assistant project directors are Peace Corps Volunteers who have been secunded to CARE/MEDICO from the National Institute of Nutrition. The field technical director has been secunded to CARE from the Tunisian Committee of Social Solidarity.

The two field assistants will be local hires paid by project funds.

2. How the P.V.O. plans to provide for technical assistance

The project's technical assistance will be from 2 primary sources : CARE/MEDICO Tunisia and Peace Corps/Tunisia.

The project director is a paid CARE staff member who is well versed in project design and implementation. (See Appendix for more detailed backgrounds on project personnel).

The assistant project directors, are Peace Corps Volunteers Two P.C.V.'s have worked on this particular project design and will have a major role in setting up and implementing the project. A replacement volunteer will be provided by Peace Corps to insure continuity until project conclusion.

3. Basic assumptions about the availability and P.V.O. management of resources.

CARE maintains a mission in Tunisia located in the capital of Tunis. There are the following administrative personnel who [illegible] attend to various duties including the management of resources: country director, 2 assistant directors.

4. Proposed Disbursement and Procurement Procedures and Related Controls:

This aspect will be taken care of through the [illegible]tablished financial controls and procedures of CARE/Tunisia and CARE/New York.

5. Schedule of actions required, their timing and interrelationship, and points of responsibility for carrying them out. See timing grid following for a composite view of project actions, timing interrelationship and points of respondibility.

The schedule of actions for this project will be discussed in terms of phases and each phase will be broken down into smaller time blocks and explained. (Refer to Appendix : Staffing Pattern for implementation responsibilities).

a) Phase I: PLANNING. This part of the project will consist of the time needed to prepare for the training seminar and the in-center project.

Month 1, 1st two weeks.#3: Design benchmark questionnaire to be given to mothers and young girls (future mothers).

Mid-month 1 to mid-month 2 #4: Validate benchmark questionnaire in centers other than those under consideration for use in the project. The questionnaire itself must first be tested to insure that the questions asked are not ambiguous; e.g: each question on the questionnaire will be worded two different ways but with the purpose of illiciting the same information. Then, if mothers consistently respond to the two questions with confilicting answers it will prove that the questions are invalid and need to be rephrased and tested again. As this questionnaire ultimately will serve as a major mode of project evaluation, it is of paramount importance that it be truly valid in the information it seeks to gather through its questions.

It also is important that the questionnaire validation take place in a center other than those under consideration for use in the in-center project. This is due to the fact that various changes may be made in some of the questions and the objective is to give the same questionnaire in all selected centers.

Mid month 2 to end month 2.#5: Design pre-seminar awareness survey to be given to health and social personnel before training seminar. The purpose of this awareness survey will be to measure knowledge and awareness the personnel presently have. It also will serve as an aid in pointing out areas of deficiency which will need attention in the training seminar.

Month 3. #6: Final selection of centers to be used in the project. Centers will be selected according to the following criteria:

a) the physical space of the center is such as to allow adequate space for nutrition education activities.

b) availability of personnel in each center to do nutrition education

Concurrently, a determination of the appropriate equipment for each center will be made.

Month 2 to month 9 #11: Purchase equipment. The purchasing of equipment will begin with the project vehicle and will be interspaced throughout the above mentioned time.

Month 4 #7: Give questionnaire to mothers and young girls in selected centers and evaluate results. Following the collection of these questionnaires, each will be evaluated so as to ascertain where the areas lie in which education is needed. These areas will then be incorporated into the manual which will be used during the training seminar. Particular emphasis on these areas during the training seminar for health and social personnel will serve to focus on those areas where nutrition education will be most valuable.

Month 5. #8: Give pre-seminar awareness survey to all health and social personnel in selected centers and evaluate results.

Month 5 - Month 8. #9 and #10: Prepare manual for use in training seminar and create visual aids to be used in training seminar and in selected centers.

Month 9 - Mid Month 9 #12: Reevaluate inputs. This will give the project personnel an opportunity to meet with all counterpart agencies re: the selection of seminar participants, rediscussion of project goals and projected outcome, as well as reevaluation of their commitment and support to the project.

Mid Month 9 - End Month 9 # 13: Final selection of seminar participants.

Mid Month 9 - Month 10 # 14: Selection of instructors for training seminar in conjunction with INTA.

Mid month 10 - Mid month 11 # 15: Final joint preparation of the training seminar in conjunction with NIN

b) PHASE II: TRAINING

Mid month 11 to Mid month 12. #16: Conduct training seminar. Following completion of the training seminar, a comparative after-test will be given during the period designated as Phase II but since this is a means of evaluating the effectiveness of the seminar, it will be considered part of Phase IV.

Mid month 12 -End month 12 #18: Equip all centers. During these two weeks CARE field personnel will assist the center personnel in setting up effective demonstration areas in each center. The involvement of the center personnel is felt to be a vital part of further motivating them to a more active involvement in the nutrition education activities in their respective centers.

c) PHASE III: IMPLEMENTATION.

Month 13 - month 25 #19: Conduct nutrition education activities in all selected centers.

d) PHASE IV: EVALUATION.

Month 14 - month 25. # 20: Evaluation and social personnel in nutrition education role in centers. These evaluations will be bi-monthly throughout the life of the in-center project and will be conducted by CARE field personnel. A standard form will be used for all evaluations and will include quantifiable as well as qualifiable sections.

Month 26 - # 21: Comparative questionnaire given to mothers and young girls. At the outset of the in-center project, each mother and young girl will receive a numbered card which will correspond to ther number on the questionnaire. These cards will be blocked off and labled as to the various informal sessions to be offered i.e., breastfeeding, preparation of local foods, etc. Each time a mother or young girl attends a session, the center personnel will check off the type of session and date it as well. This will be done in an effort to more thoroughly evaluate the outcome of the nutrition-education.

The comparative questionnaire given at the end of the project will be evaluated and compared to the one given at the beginning of the in-center project. In addition, the questionnaires will be evaluated relative to the sessions attended by the mothers and young girls; i.e. if a mother attended a session on breastfeeding, is this reflected in her answers on the second questionnaire given.

Month 26 - month 27. : Final Project Evaluation and Report. See IV.-B.

B. Measurement and Evaluation of Project Accomplishment

1. Schedule of planned accomplishment:

a. 15 nurses' aids and 15 social [illegible] and rural extension agents trained in nutrition/health concepts and their application by month 12 of the project. To determine whether or not the seminar participants have, in fact learned the necessary concepts a pre-seminar awareness survey will be given. This will indicate those areas in which each participant lacks adequate nutrition/health concepts. Upon completion of the seminar, the survey will again be given to the participants and a comparison made with the original survey. In addition, the recycled personnel will also be observed in the field by the CARE project personnel to determine whether or not the information is being effectively demonstrated to the women who come to the centers. The personnel will be observed once every 2 weeks and a standardized observational checklist used by CARE project personnel to evaluate their performance.

b. 2 trained cooperating host country personnel (Nutritionists) in the areas of project implementation and evaluation by the end of the project. Because this output is not expected until the end of the project, indirect means must be used to determine whether or not this output has occured. Ideally, this would be verified if the 2 newly trained personnel could be observed implementing successfully another similar project and evaluating it. But, this would necessitate follow-up evaluation long after this project's end. Therefore, during the project, the project director and assistant project directors will periodically evaluate the performance and effectiveness of the host country personnel in an effort to reasonably predict their future effectiveness in a similar project.

c. 40 nutrition/health education manuals created for use by month 8 of the project. The most visible reflection of this particular output will be that the manuals are printed. The effectiveness of these manuals as teaching aids will be reflected in the questionnaire given to the seminar participants as previously explained as well as observing the personnel in their nutrition/health education role.

d. 15 centers equipped for nutrition/health education activities by month 12 of the project. Evidence of this input will be the equipped centers. Further evidence will be that the supplied equipment is being effectively used.

e. visual aids for the seminar and the 15 centers created for use by month 8 of the project. Their effectiveness will be reflected on the seminar participants post-seminar awareness survey and on the after-project questionnaire given to the women in the 15 centers.

2. Project Evaluation

For the purpose of this project, there will be 4 distinct subdivisions under the area entitled "Evaluation". Each subdivision will be explained below with relation to its role in the project.

CARE project personnel will be responsible for all parts of the evaluation process, ongoing and final.

a. Monitoring: this will involve the day-to-day supervision of the project in terms of such things as procurement and assuring that the project is progressing on schedule. Monthly monitoring reports will be made to determine whether or not the project has in fact been keeping within the pre-determined time schedule.

b. Audits: these also will be done on a monthly basis. These will seek to define any inefficiencies in the implementation which have slowed down the project. In the event that a deficiency is found, steps will be taken to correct the defect to insure smoother running of the project.

c. Inspections: these are designed to study project operations. Examples of such inspections are the pre and post project questionnaires to be given the women in the target group, the pre and post seminar awareness survey to be given the seminar participants, and the growth curve charts an immunization records to be kept on the children (birth to 4 years) of participating women.

d. Evaluation: CARE is required by its New York Headquarters to submit quarterly Plan Implementation and Evaluation (PIE) progress reports. This CARE PIE form will be used to assist in the evaluation phase. In addition, during the life of the project the A.R.P. progress reports, which like the CARE P.I.E. measure the actual versus the planned achievement indicators, will be utilized.

For all evaluations CARE/Tunisia will provide the personnel, assisted by the PCV's assigned to CARE, as well as host country counterparts.

Upon completion of the project, CARE is required by its New York office to submit an evaluation report. This will also be submitted to US AID. The report includes discussions on: project results, project implementation and comments.

Among the attachments will be the complete "before" and "after" reports on questionnaires and an analysis of the growth charts on the sample population.

NARRATIVE SUMMARY	OBJECTIVELY VERIFIABLE INDICATORS	MEANS OF VERIFICATION	IMPORTANT ASSUMPTIONS	
Program or Sector Goal: To improve the nutrition of the population particularly among women in the child-bearing years and children in the 1st 4 years of life.	1. A decrease in infant and early childhood mortality 2. A decrease in infant and yearly childhood morbidity particularly: a. gastroenteritis b. pneumopathies	1. Ministry of Public Health (MOPH) yearly statistics of infant and early childhood morbidity & mortality	1. Continuing participation on the part of Tunisian counterpart agencies.	part of the Ministry of Social Affairs
Project Purpose: Promote an increase in awareness and application of nutrition & health concepts among mothers & adolescent girls (future mothers) in the Gouvernorat Tunis Sud	Conditions that will indicate Purpose has been achieved (EOPS) 1. Increase in the # of children immunized 2. Increase in the # of children who adhere to a smooth & consistent growth curve 3. Increased application of the principles of breastfeeding 4. Changes in food spending habits in favor of foods high in protein, vitamins and minerals	1. Centers' records 2. Use of a modified children Medical Center (Boston) anthropometric chart for height, weight, & head circumference 3. This will be reflected on the growth charts & also on the questionnaires described in #4 4. Benchmark questionnaire administered to a sample group of the target population in each center before Nutrition education begins; comparative questionnaire to same group at end	1. That the mothers themselves perceive the need to carry out sound nutrition & health practices 2. That the recycled personnel perceive the need for nutrition/health education & disseminate the information effectively	6. TOTAL: $44,090 a. $1,755-month 11 b. 4,563-month 12-26 c. 8,580-month 12-26
Project Outputs: 1. Recycled Tunisian Health & social personnel trained in nutritional concepts & application 2. Trained cooperating host country personnel (Field technical assistants) in project implementation & evaluation 3. Nutrition education manuals created for use 4. Equipped centers for nutrition education 5. Visual aids for seminar & centers created	1. 15 nurses'aides & 15 social assistants & rural extension agents by month 12 of the project 2. 2 nutritionists by end of project 3. 40 manuals by the end of month 8 4. 15 centers by the end of month 12 5. For 15 centers by the end of month 8	1. Questionnaire of trainees nutrition awareness before & after training seminar and field observation by CARE project personnel through the use of a standardized observational checklist 2. Observation & evaluation by project director & assistant project director 3. Manuals are printed 4. Centers are equipped 5. Visual aids in use	1. Continued participation on the part of: a) National Institute of Nutrition (NIN) b) Ministry of Public Health (MOPH) c) Ministry of Social Affairs (MOSA) d) Gouvernorat of Tunis Sud 2. That the cooperation country personnel participate well on the project 3,4,5) That the necessary materials will be available to do these things	6. Tunisian Ministry of Social Affairs funding for: a. salary for 15 seminar participants (1 mo. x TUD45) b. personnel costs (15 x TUD45 x 13 mo. x 20%) c. social center facilities, supplies (11 centers x TUD125 x 12 mo. x 20%)

V. FINANCIAL PLAN

	FY 75	FY 76	FY 77	Total
A. Grant Total (AID)	$ 5,772	$29,089	$11,785	$ 46,646
B. Project Costs				
Personnel	16,518	45,681	38,666	100,865
Training	-	11,270	-	11,270
Commodity	4,200	11,364	-	15,564
Other Costs	4,595	14,333	18,428	37,356
TOTAL	$25,313	$82,648	$57,094	$165,055
C. Sources of Funding				
1. Grant Total (AID)	$ 5,772	$29,089	$11,785	$ 46,646
CARE/MEDICO	6,630	11,314	11,314	29,258
Peace Corps	10,252	20,504	10,252	41,008
NIN	2,659	11,523	9,625	23,807
MOPH	-	4,199	5,239	9,438
MOSA	-	6,019	8,879	14,898
2. TOTAL	$25,313	$82,648	$57,094	$165,055

NOTE

1. PVO Grant April 1975 through June 1977.

2. AID Grant includes 20% price fluctuation.

ATTACHMENT A

Project Cost Breakdown: USAID Financed

	FY 75	FY 76	FY 77	TOTAL
1) Personnel Costs				
2 Field Assistants $	900	6,599	6,599	$ 14,098
2) Training Cost				
Seminar Transportation & subsistence (30pers/Month)	-	4,400	-	4,440
Lecturers' fees	-	500 550	-	500
Total	-	4,950	-	$ 4,950
3) Commodity Costs				
Training Manuals	-	1,000	-	1,000
Visual aids materials and preparation	-	1,430	-	1,430
Demonstration equipment and furnishings	-	6,750	-	6,750
Audio-visual	-	290	-	290
1 vehicle	3,500	-	-	3,500
TOTAL $	3,500	9,470	-	$ 12,970
4) Other Costs				
Travel expenses	190	1,872	1,872	3,934
Vehicles Maintenance & repair	120	750	750	1,620
Fuel	100	600	600	1,300
Total $	410	3,222	3,222	$ 6,854
TOTAL $	4,810	$ 24,241	$ 9,821	$ 38,872
20% price fluctuation	962	4,848	1,964	7,774
TOTAL PVO GRANT $	5,772	$ 29,089	$ 11,785	$ 46,646

ATTACHMENT B

Project Cost Breakdown: CARE/MEDICO Financed

		FY 75	FY 76	FY 77	TOTAL
1) Personnel Costs					
U.S. Personnel	$	1,400	2,360	2,360	$ 6,120
National Personnel		1,517	2,582	2,582	6,681
2) Operations	$	3,713	6,372	6,372	16,457
Total	$	6,630	11,314	11,314	$ 29,258

ATTACHMENT C

Project Cost Breakdown: Peace Corps Financed

	FY 75	FY 76	FY 77	TOTAL
1) Personnel Costs $	10,252	20,504	10,252	$ 41,008

1 PCV FY 75
2 PCV FY 76
1 PCV FY 77

($11,500 less $1,248-NIN- per year)

ATTACHMENT D

Project Cost Breakdown:

Tunisian National Institute of Nutrition

	FY 75	FY 76	FY 77	Total
1. Personnel				
(a) ½ P.C.V. living allowance	$1,248	$ 2,496	$1,248	$ 4,492
(b) Six, ¼-time NIN personnel	1,021	4,087	4,087	9,195
(c) Two nutritionists	-	2,925	3,900	6,825
2. Training				
(a) Seminar facilities	-	520	-	520
(b) Seminar instructors (140 person hours)	-	780	-	780
(c) Seminar admin. costs	-	520	-	520
3. General Administrative Support	390	195	390	975
TOTAL:	$2,659	$11,523	$9,625	$23,807

ATTACHMENT E

Project Cost Breakdown: Tunisian Ministry Of Public Health

	FY 75	FY 76	FY 77	TOTAL
1) Training 15 participants (1month x 45TUD)	-	$ 1,755	-	$ 1,755
2) Personnel Costs (15 x TUD 45 x 13 months x 20%)	-	1,404	3,159	4,563
3) MCH facilities, supplies (4 x TUD 125 x 12 months x 20%)	-	1,040	2,080	3,120
TOTAL	-	$ 4,199	5,239	$ 9,438

ATTACHMENT F

Project Cost Breakdown: Tunisian Ministry Of Social Affairs

	FY 75	FY 76	FY 77	TOTAL
1) Personnel Costs				
(15 x TUD45 x 13 months x 20%)	-	$ 1,404	3,159	$ 4,563
2) Training 15 participants				
(1 month x TUD45)	-	$ 1,755	-	$ 1,755
3) Social Center facilities and supplies				
(11 centers x TUD 125 x 12 months x 20%)	-	2,860	5,720	8,580
TOTAL		$ 6,019	8,879	$ 14,898

APPENDIX A : Background Information on the Health and Social Personnel in Tunis Sud

Background Information on the health and social personnel

Social workers (Assistants Sociaux) and rural extension agents (Animatrices Sociales) are trained at the National School of Social Service in Tunis, which was created in 1964. The school is operated by the Ministry of Social Affairs.

Admission to the program leading to a State Diploma in Social Work is open to men and women from the ages of 18 to 30. Candidates must have completed the seventh year of secondary school (all of high school) and pass a physical and an entrance exam consisting of a written essay and an interview. The program of study is three years, during which time the student receives a monthly living allowance (bourse) of TD 26 ($65.00). The student signs a contract for ten years and agrees to work anywhere in Tunisia. Training includes theory courses, practice work and discussions, and field experience in community work in Tunis and the interior. The school catalog lists theory courses in the following subjects: psychology, law, sociology, economics, health, culture, social research and legislation, and social work and methods related to children, the family health, family planning, and the community. Students do community observations and field work in social development centers (Centres de Developpement Sociale), their usual place of assignment after graduation.

The program leading to a rural extension agent is a two year program for young women 18 years of older who have completed the fourth year of secondary school (tenth grade). Candidates must pass a physical and an entrance exam consisting of a written essay, dictation in

Arabic, sewing, and an interview. Students reside in the dormitory and receive TD 4 (10.00) a month pocket money. The student signs a contract for five years and agrees to work anywhere in Tunisia. Training includes theory and practical courses and several "stages" in Tunis and the interior. The school catalog lists the following subjects in the curriculum: methods of social action, human relations, social legislation, health, child care, food, family planning, gardening, agriculture, sewing, cooking, home management, and economy in the home. "Stages" are held in local social developement centers, MCH centers, day nurseries, and family planning center services.

After certification, the extension workers go to work in regional or local social development centers, or in rural centers for young girls.

We note that health and nutrition are little emphasized in the curriculum for the social workers. The extension agents have more exposure to health, nutrition and related subjects, but because of a somewhat text-oriented approach to the subject, the girls could benefit form additional instruction in the practical application of nutrition and health concepts.

The nurses' aides (Aide Soignantes) are trained in a two year program at schools operated by the Ministry of Public Health. Applicants must have completed their third year of secondary school (ninth grade). Students usually spend their mornings in observation and training in hospitals, and the afternoons in classes at the school. Although nutrition is integrated into curriculum, practical applicaion is limited. In Tunis, the students spend three or four one-hour sessions with the nutritionist at the Children's Hospital, where they learn the nutritional value of foods, the preparation of weaning foods and the age at which to introduce them, and how to present a good demonstration.

Some nurses' aides are occasionally selected by their supervisors to do and informal one or two month "stage" at the Bellvue MCH center in Tunis during which there is particular emphasis on infant nutrition.

APPENDIX B: Health and Social Personnel in Tunis Sud

TABLE B 1

HEALTH CENTERS AND PERSONNEL-GOUVERNORAT OF TUNIS SUD

DELAGATION	MCH Center	Auxillary Hospital	Rural Dispensary	Midwives	Nurses' Aides
Sidi Thabet	Kalaâ El Andalous	———	Sidi Thabet Borj Taouil El Habibia	1	1
La Mornaguia	———	———	Borjel Amri Feuchana Mornaguia Khledia	———	———
Teboura	Tebourba	Tebourba 12 beds	Borj Toumi Jedaïda Dkhila Chouigui	1	2
El Fahs	El Fahs	El Fahs 12 beds	Bent Saïdane Barrage	1	3
En Nadhour	———	———	Ain Battoum En Nadhour	———	———
Zaghouan	Zaghouan	Zaghouan 60 beds	Bir M'cherga Bir Halima Zriba	1	2
Mornag	———	———	———	———	———
TOTALS	4	84 BEDS	18	3	8

TABLE B2

SOCIAL CENTERS AND PERSONNEL

Gouvernorat of Tunis Sud

DELEGATION	VILLAGE	SOCIAL WORKERS AND RURAL EXTENSION AGENTS
Sidi Thabet	Sidi Thabat	3
	Sebalet Ben Ammar	1
	El Habibia	1
	Kalaâ El Andalous	2
	Oued Ellil	2
	Béjaoua El Mouizzia	1
	Essaïda	2
	Borj Taouil	1
El Mornaguia	Mornaguia	5
	Borj El Amri	2
Mornag	Mornag	3
	Fouchana	2
	Nahsen	1
	El Mohamadia	1
	Djebel El Oust	1
	El Khélidia	1
Tebourba	Tebourba	2
	El Battan	1
	Dekhila	1
	Djedaïda	2
Ennadhour	Nadhour	3
El Fahs	Fahs	4
Zaghouan	Zaghouan	1
	El mogran/Sminja	1
	Bir M'cherga	1

APPENDIX C : Letters of support

TRANSLATION:

Tunisian Republic

Ministry of Public Health

National Institute of Nutrition

Temporty Office:
120, Avenue de la Liberté
T U N I S

1300

Tunis, September 18, 1973

The Director of CARE/MEDICO
45, Rue Alain Savary
T U N I S

Dear Sir:

From a letter from Miss Cynthia Reeser, nutritionist of CARE/MEDICO, we learned that you suggest to start a pilot project of nutrition education in the Governorate of Kef.

In my opinion, this is a very commendable initiative which evidences once again the efforts made by your Administration to improve the state of nutrition in Tunisia.

I may assure you of the full collaboration of the National Institute of Nutrition and, in order to better rationalize any communication between our two organizations, I would like to inform you that I have designated Mr. Kouki, Chief of the Section of Institutional Feeding, to be the only correspondent of the Institute with CARE/MEDICO.

Sincerely,

Signed:
Professor Z. KALLAL

grz:2-7-75

TRANSLATION:

#7052

Tunis, October 23, 1974

The Governor of Tunis-South

-TO-

The Director of CARE/MEDICO
45, Rue Alain Savary
T U N I S

Through

The Minister of the Interior

-=-=-oOo-=-=-

Dear Sir:

Following the meeting of your Nutritionist with our Delegate for Social Affairs, on October 19, 1974,; your letter dated October 21, 1974; and our meeting of October 22, 1974, at the Seat of the Governorate, on the Nutrition Education Project which your organization intends to implement within our Governorate, we would like to inform you of our agreeing with your implementation of this project whose objective will essentially be the purely educative task together with a more thorough training of managerial staff in the field of animation and social assistance in the rural environment.

Hoping for the success of this planned project,

Sincerely,

Signed:

The Governor
M'hamed ABBES

grz:2-7-75

APPENDIX D : CARE/Tunisia Staffing Pattern for Nutrition Education Project

CARE/TUNISIA
STAFFING PATTERN
FOR
NUTRITION EDUCATION PROJECT

I. Country Director: George H. Radcliffe

A. Qualifications and Experience

1. Country Director-CARE/MEDICO-Tunisia
2. Involved in CARE overseas feeding programs for 11 years

B. Responsibilities

1. PR with host country agencies
2. Hire project field technical assistants
3. Evaluation of inputs
4. Submit final project report and evaluation

C. Time to be spent on the project
5% for the life of the project

II. Project Director: Edward E. Brand

A. Qualifications and Experience

1. Associate Director in charge of Nutrition Programs, CARE/Tunisia
2. Administrative and field experience overseas for the past 10 years
3. Administrator of Project POSHAK, CARE, Madhya Pradesh, India, 1970-74.

B. Responsibilities
1. Supervise all phases of the project
2. Assist in hiring the field technical assistants
3. Assist in the initial evaluation and reevaluation of the inputs
4. Purchase of equipment
5. Prepare CARE quarterly P.I.E. reports
6. Preparation of the final project report

C. Time to be spent on project
25% of time for life of the project

III. Associate Project Director: Cynthia K. Reeser

A. Qualifications and Experience

1. B.S. Home Economics, Ohio State University
2. Two years experience in applied nutrition programs, Division of Applied Nutrition, CARE/Tunisia.

a, experimentation with and encouraging use of PL 480 commodities (e.g. WSB in enriched macarone biscuits, breads, etc.) in school canteens and MCH centers

b. developing nutrition education project

3. Peace Corps Volunteer assigned to CARE April 1973-May 1976

B. Responsibilities

1. Coordinate all phases of the project
2. Design questionnaires
3. Design pre-seminar awareness survey
4. Contact with administrators
5. Evaluate questionnaires
6. Prepare manual and visual aids
7. Assist in selection of seminar partiwipants
8. Manage training seminar
9. Supervise on-going evaluations
10. Assist in the preparation of monthly progress reports

C. Time to be spent on the project
100% until May 1976

IV. Associate Project Director: Noreen A. Hynes

A. Qualifications and Experience

1. B.S.N. , Nursing, Seton Hall University, New Jersey
2. Certified Pediatric Nurse Associate. College of Medicine and Dentistry of New Jersey and Seton Hall University, Graduate Di ision
3. Peace Corps Volunteer assigned to CARE January 1975- October 1976
4. Counselling experience in a community mental health center 1973-1974
5. Design, implementation, and e aluation of a small research project dealing with school age children in first through sixth grades, 19 1

B. Responsibilities

1. Coordinate all phases of the project
2. Design questionnaires
3. Design pre-seminar awareness survey
4. Contact with administrators
5. Evaluate questionnaires
6. Prepare manual and visual aids
7. Assist in selection of seminar partivipants
8. Manage training seminar
9. Supervise on-going evaluations
10. Assist in preparation of monthly progress reports
11. Conduct final project evaluation

12. Assist in preparation of final project report

C. Time to be spent on th project
100% for the life of the project

V. Field Technical Director: Taieb Belhassen

A. Qualifications and Experience

1. In charge of the Division of Applied Nutrition, CARE/MEDICO-Tunis, March 19[illegible]1 to the present
2. Graduate of the Superior School of Nutritional Sciences, Tunis 1962
3. School Canteen inspector, 1969-19[illegible]1
4. Public Health Inspector, Municipality of Tunis, 19[illegible]-1969
5. Functionary, Ministry of Public Health, 1962-19[illegible]
6. Member, Tunisian Society for Dietetics and Food Hygiene

B. Responsibilities
1. Direction and execution of field activities
2. Validate benchmark questionnaire
3. Assist in the design of the pre-seminar awareness survey
4. Contact with administrators
5. Select project centers
6. Give questionnaires
7. Assist in the preparation of manual and visual aids
8. Assist in selection of seminar participants
9. Assist in organization of training seminar
10. Assist in the management of the training seminar
11. Equip centers
12. Conduct on-going evaluations
13. Assist in final project evaluation

C. Time to be spent on the project

60% for life of the project

VI. 2 Field Technical Assistants (to be hired)

A. Qualifications and experience

1. Diploma from the Superior School of Nutritional Sciences with a specialization in the medical/social area.
2. Female
3. Experience preferred

B. Responsibilities

1. Assist in the selection of project centers
2. Give questionnaires
3. Givepre-seminar awareness survey
4. Assist in preparation of manual and visual aids
5. Assist in organization of training seminar
6. Assist in selection of seminar participants
7. Equip centers
8. Conduct on-going evaluation of center activities
9. Assist in final project evaluation

C. Time to be spent on project

100% for life o project

AIRGRAM

DEPARTMENT OF STATE

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PSD	2	
SA		
SPP		
TECH		1

DATE REC'D. AUG 12 AM 8 57

FILE

DATE SENT 8/4/75

FROM - TUNIS

E.O. 11652: N/A

SUBJECT - CARE PVO Project: Project Proposal for Nutrition/Health Education in Tunis Sud

REFERENCE - (A) TUNIS 1519; (B) STATE 077634; (C) TUNIS 2061

FOR SUE GIBSON, NESA/TECH

1. USAID has now completed the review of subject project paper and forwards it herewith for your consideration.

2. The CARE proposal follows an A.I.P./logical framework format. The activity requires a total grant of $51,496. Given small dollar amount involved, USAID recommends obligation of full amount in FY 1976 with expenditures occuring in FY 1976, FY 1977 and FY 1978. Total estimated funding from CARE, AID, Peace Corps, NIN (National Institute of Nutrition), MOPH (Ministry of Public Health) and MOSA (Ministry of Social Affairs) is the equivalent of $169,905. The original proposal is amended by CARE letter No. 457.

3. This proposed project is designed to benefit through replication, mothers and children in the lowest income groups in the Tunis Gouvernorate at first, and subsequently throughout Tunisia. It is consistent with the USAID strategy on Nutrition and Health in Tunisia.

4. There follows a brief narrative logical GPOI (Goal - Purpose - Output - Input) description,

Program or Sector Goal:
To improve the nutrition of the population particularly among women in the child-bearing years and children in the first four years of life.

Attachment: SENT TO: NESA 8/13/75.
(1) "Nutrition/Health Education in Tunis Sud" by C. Reeser (10 copies) together with Proposal Supplement (1 copy), as amended by CARE letter No. 457 dated 7/28/75
(2) LHS/PTP memo to Mr. Holtaway, PDS dated 5/16/75

PAGE 1 OF 3 PAGES

DRAFTED BY	OFFICE	PHONE NO.	DATE	APPROVED BY:
JMacdonald:ne	LHS/PTP	395	6/24/75	DIR: ULJones

A. I. D. AND OTHER CLEARANCES
FMS: ABolling (draft 7/28/75) HRR: JWKennedy (draft 7/28/75) D/DIR:
NFO: MHamaidan (draft 7/28/75) PPC: DCarlson HLThompson

DECLASSIFIED
CLASSIFICATION

AID-34 (1-71) ACTION OFFICE - When ACTION completed, return (Do not type below this line) OFFICIAL FILE STATION or appropriate OFFICIAL FILE.

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DATE	SIGNATURE

PRINTED 12-71

Project Purpose:

Promote an increase in awareness and application of nutrition and health concepts among mothers and adolescent girls (future mothers) in the Gouvernorate Tunis Sud.

Project Outputs:

1. Recycled Tunisian Health and Social Personnel trained in nutritional concepts and application.
2. Trained cooperating host country personnel (Field Technical Assistants) in project implementation and evaluation.
3. Nutrition education manuals created for use.
4. Equipped centers for nutrition education.
5. Visual aids for seminar and centers created.

Project Inputs:

1. USAID funding for:

   a. 2 host country field assistants
   b. seminar transportation and subsistance
   c. lecturers' fees
   d. training manuals
   e. visual aids material and preparation
   f. demonstration equipment and furnishings
   g. audio-visual
   h. vehicle
   i. travel expenses
   j. vehicle maintenance and repair
   k. fuel

2. CARE/MEDICO funding for:

   a. U.S. personnel
   b. National personnel
   c. Operational expenses

3. Peace Corps funding for:

   a. 1/2 PCV subsistance allowance
   b. vacation allowance
   c. language training
   d. travel to and from country

4. Tunisian National Institute of Nutrition funding for:

   a. 1/2 PCV's living allowance
   b. seminar facilities
   c. seminar instructors (140 person hours)
   d. seminar administrative costs
   e. general administrative costs

5. Tunisian Ministry of Public Health funding:

   a. salary for 15 seminar participants (1mo. x TD 45 x 13 mo x 20%)
   b. personnel costs (15 x TD 45 x 13 mo. x 20%)
   c. MCH facilities, supplies (4 x TD 125 x 12 mo. x 20%)

6. Tunisian Ministry of Social Affairs funding for:

   a. salary for 15 seminar participants (1 mo. x TD 45)
   b. personnel costs (15 x TD 45 x 13 mo. x 20%)
   c. social center facilities, supplies (11 centers x TD 125 x 12 mo. x 20%)

5. The proposal shows in detail the estimated contribution of each agency (U.S. and GOT) involved in this project. It should be noted that in some instances the GOT contribution consists primarily of maintaining participants on ministerial payroll during the training provided under the project.

6. USAID urgently recommends approval of the project as soon as possible because the tours of the Peace Corps personnel are underway and may need extension/replacement action depending on the date of project approval. The project proposal was delayed in submission from CAHE because of a slight auto accident involving one of the project designers and is thus behind schedule. CAHE is ready to begin work ASAP.

SEELYE

Mr. J. Holtaway, Acting Chief, PPS

John W. Macdonald, Chief, IMS/FFP

Nutrition/Health Education in Tunis Sud (CARE Project submitted USAID, 12 May 1975)

1. Because I am leaving on A/L 16 May and had four days to review the submission, my review of subject project was not in depth and excluded a detailed coverage of the Project Cost Breakdown covered in Appendix A and elsewhere.

2. I believe that the final project submission should be clear as to what skills, approach or equipment the CARE team has which are not available to NIN or the Institute Superior of Nutrition. There are several inconclusive statements to the effect that the GOT/academic approach to nutrition differs from that available in the USA by being more theoretical than practical. However, instead of giving the impression that the project merely fills in a resource gap rather than transmits a new skill, this should be made clear by stating exactly what is the uniqueness of the CARE approach. After reading the project one should have more than an inference that the NIN or the Institute Superior of Nutrition does not, or can not provide what subject project purports to do, if that is the case.

3. There is some confusion concerning the means of evaluating the project. For instance, before and after morbidity and mortality are mentioned as a quantitative measurement of project impact as are growth measurement and increase in recorded immunizations among the targeted group. Will the project provide for both criteria and if so is the project period long enough to contain within its time span, these forms of quantitative indicies, i.e. will mortality and morbidity and growth measurement manifest themselves sufficiently within the time frame of the project.

4. Concerning base line data one could hazard a guess that it would be difficult to find children or even mothers perhaps, within the project area who have not benefitted at one time or another from P.L. 480 program (or other) feeding. Perhaps baseline data should be developed from more remote areas.

5. Concerning statistics given (see page 5 of proposal) the reason (for deaths), "congenital malformation" should be footnoted and explained. If this implies death through heart deformations or other such anomalies, perhaps better nutrition would have no impact on these conditions and thus any quantitative measurement of mortality and morbidity would be correspondingly affected.

6. Concerning the financial aspect of this project I believe the following should be explained in greater detail:

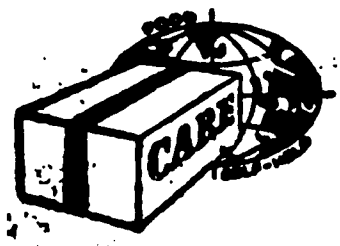
(A) USAID funding for lecturers' fees i.e. who are lecturers etc.
(B) Ultimate disposition of project vehicle and procurement source.

Assuming the foregoing points are covered I concur in USAID approval of this project for submission to AID/W.

cc: DIR, D/DIR, NTO, HUR, IMS, CARE
LMS-2
C&R-4

IMS/FFP: JWMacdonald:ze:5/16/75

664-189



CARE/MEDICO

TUNIS - TUNISIA

18, Avenue Docteur Conseil

TELEGR. : CARETUNIS

Téléphone : 282.578 / 285.737

CARE to USAID No. 457

July 28, 1975

REC'D USAID 7/29/75

Mr. John W. Macdonald
Food for Peace Officer
USAID Mission to Tunisia
149, Avenue de la Liberté
T u n i s

ACTION:
LMS/FFP

INFO:
DIR
D/D
PPS
FMS
HUR/NTO
PSS
CF
RF 2

LMS FFP 8/6

Subject: Nutrition/Health Education Project

Reference: CARE/USAID Nos. 439, 445

Dear John,

I am writing in connection with the meeting held on July 24th in your Office and attended Messrs. Carlson, Sadler and yourself of USAID, Nugent of C.R.S, Radcliffe and Brand of CARE. The meeting was called to clarify certain questions raised by the Program Department.

Please consider the following as amendments to the original proposal (CARE/USAID No. 439 dated 9 May 1975) and supplementary information submitted on May 12, 1975:

1) The PVO Grant budget will be changed to allow the purchase of a U.S. Vehicle and parts. Therefore under Attachment A, Section 3, the budgeted amount for 1 vehicle should be changed to $5,750 (vehicle $5,000 plus standard manufacturers parts package $750). In addition, the total fuel cost (27 months) should be changed from $1,300 to $3,900. In effect this raises the total grant request from $46,646 to $51,496.

2) The project in no way conflicts with or duplicate any on-going or previous efforts in Tunisia. It is designed to develop methods to up-grade and support existing paramedical and social worker staff in their ability to teach and deal with nutrition and health education.

3) The Tunisian Government through the National Institute of Nutrition supports the project and hopes to exte this approach to other areas.

.../...

.../... (Continued)

4) At the operational level, the Governorate of Tunis Sud, CARE has support and agreement for cooperation in the implementation of the project.

5) We request that the total grant amount ($51,496) be obligated in FY'76.

6) Page 15 - The phase "Alphabetisation Centers" should denote Adult Litracy Centers.

I trust that with the above information and changes the project can be submitted to AID/Washington for further processing.

Warmest regards.

Sincerely,

Edward E. Brand
Assistant Country Direct
CARE/Tunisia

EB/hh.

OPG PROPOSAL SUPPLEMENT

NUTRITION/HEALTH EDUCATION IN TUNIS SUD

This supplement was prepared following discussions between US AID/TUNIS and CARE/TUNIS concerning CARE's Nutrition/Health Education Project proposal submitted to AID/T on May 12, 1975.

I. Mr. John W. Macdonald, Chief, IMS/FFP, discussed the need for further clarification of several points in a memo of 5/16/75 to Mr. James Holtaway, then Acting Chief, PPS, of which CARE received a copy. In the attached supplement we reply to points #2 through #6 of Mr. Macdonald's memo. Although we have preceeded each topic with a brief heading or question, please refer to the memo for precise wording of the points in question.

Supplement to PPG Proposal: NUTRITION/HEALTH EDUCATION IN TUNIS SUD

No. 2 - Question being asked: What is the uniqueness of the CARE approach to nutrition/health education which at present the NIN or the Superior School of Nutrition does not or cannot do?

The project proposed by CARE is unique in that it contributes to:

1) the systematic, carefully-evaluated application of stated nutrition education goals and priorities.

The N.I.N's outline of the various means of integrating nutrition education into local institutions was referred to in the text of the project proposal, pp 14-16. In order to determine the most practical and beneficial approach for allocating limited resources for nutrition education, it is best to conduct systematic feasibility studies such as the one proposed. This will result in:

2) the establishing of a model or prototype approach to nutrition education which can provide guidelines for the expansion of nutrition education to other areas of the country. This project, it is important to note, may never be entirely "duplicated," but rather, adapted to conditions present in other settings. Obviously the conditions and factors present in Tunis Sud would not necessarily exist in other parts of the country at future dates.

3) the acquisition of field experience and technical expertise for the two Tunisian project assistants, as well as all participating NIN personnel, in the design, implementation and evaluation of an applied nutrition project.

One of the present weaknesses of the Divisions of Applied Nutrition and of Nutrition Education, which this project could strengthen, appears to be a lack of knowledge in the areas of applied field methodologies and evaluation and assessment of approaches to improving the nutrition/health status among the population. The following example is intended only to serve as an illustration: The Division of Applied Nutrition of the NIN is presently conducting a small project in the area of nutrition education utilizing the PL480 Title II Commodity W.S.B. They are presently working in an MCH center near Tunis. The emphasis of this project appears to be on the collection of data. Questionnaires are used to gather socio-economic information and family dietary practices. There is no indication of the use to which this data will be put, or to what it will be relate

Moreover, there does not appear to be a means of measuring the success or failure of the nutrition education accompagnying the distribution of W.S.B, which is the project's stated goal. There is no record of the nutritional status of the family members, particularly children. Inclusion of a part which would record the child's height, weight and/prior to weaning and then at set time intervals thereafter along with a feeding history of weaning foods used, i.e.: W.S.B porridge, would provide valuable information in terms of:

1) effectiveness of nutrition education re: the use of appropriate weaning foods as reflected in the child's growth and development as recorded on the data sheet.

2) effectiveness of education re: use of W.S.B as a weaning food.

No. 3 - Question being asked: What are the quantitative measurements of project impact?

In line A of the Logical Framework Matrix the program or sector goal is stated and measures of goal achievement given. As outlined by USAID this sector goal indicates the broader objective to which this project contributes. The indicators also reflect this.

The project purpose (line B) zeros in what this particular project hopes to achieve and by the same taken the indicators measure. the achievement of this purpose. It is these indicators which are the quantitative measurements of the project's impact over the 27 month period of the project, not Line A; and we believe these indicators can be measured within the project's tome frame.

No. 4 - Question being asked: Will the baseline data be effected by P.L. 480 W.S.B-distribution and if so should an area of non-distribution be selected for baseline data collection?

<u>Answer:</u>

- All MCH's countrywide now receive W.S.B for distribution to pregnant and lactating mothers and children under 3 years of age.

- therefore, WSB is a constant factor in that it is present in all MCH centers

- in collecting baseline data, it will be determined who is and who is not receiving WSB - how much and how often will be noted.

This will then be a factor for consideration in the final project evaluation as to its effect, if any, on the anthropometric data collected on the children throughout the project. Particular emphasis will be given to a comparision of those children who received WSB and those who did not.
The school lunch program is designed to reach school-children between the ages of 6-12, and therefore should not in any direct way affect the target group for this project which is mothers and adolescent girls.

No. 5 - Question being asked: What is included in the category "Congenital malformations" as given on page 5 of the OPG proposal?

Answer:

- The statistics were quoted from the MOPH statistical Report for 1971. No breakdown of the congenital malformations was given. This does not, however, reflect poor reporting on the part of the GOT, as it is virtually impossible to pinpoint the exact cause of the vast majority of congenital malformations.

Globally speaking, congenital malformations etiologically fall into 4 major categories:

1. gene mutations: these account for about 10% of the deaths due to congenital malformations. These are inherited due to mendelian law due to an underlying chemical defect.
2. Chromosomal aberrations: these account for about 1% of the total deaths due to congenital malformations.
3. Adverse interuterine environment: few of these defects (congenital malformations) can be assigned a spe-specific causative entity in the interuterine environment. However, the following have been sited as adverse interuterine conditions resulting in congenital malformations:

   a - maternal rubella during the first trimester of pregnancy
   b - Toxoplasmosis
   c - Cytomegalic inclusion disease
   d - exposure to theraputic levels of radiation
   e - ingestion of certain drugs

4. Combined factors: genetic and environmental : it is posited that the majority of congenital malformatio are of this type. They appear to be familial in nature but not genetic in that there are no medelian patterns indicating inheritance. The vast majority have no demonstrated chromosomal abnomalities and no abnormal prenatal factors.

N.B. Poor nutritional status of the mother before and during pregnancy is thought to increase the incidence of congenital malformations No. 3 and No. 4

- All the statistics given for causes of death were given to demonstrate the various causes and provide a profile of mortality in the population. At no time was it inferred that the causes of death were due to nutritional deficiencies.

No. 6 - A. Explanation in greater detail re:

USAID funding for lacturers' fees ie: who are they, etc.

There will be 2 different types of lecturing personnel assisting during the seminar for training the health and social work personnel. The first type will be institute personnel who will not receive a special lecturer's fee. The second type will be persons with particular expertise who are not part of the Institute's personnel. These persons will receive a fee for lecturing.
The Institute has already indicated to CARE that they feel such persons must be called upon to lecture in specific areas. However, at this time we have not chosen these lecturers Their selection will be made through a joint selection procedure by CARE project personnel and the N.I.N.

B. Ultimate disposition of the project vehicle and procurement source.

With the completion of the project, the USAID funded vehicle will be used in similar future activities or turned-over to the N.I.N for use in the nutrition/health education area.

A waiver will be requested from USAID authorizing the purchase of a non-U.S. manufactured vehicle, specifically a Renault 4L from France. We beleive there is ample justification for a waiver, principally in terms of spare parts availability, repair facilities and operating costs in Tunisia, delivery time and initial cost.

II. The following question was posed by Mr. Charles Sadler, PPS, during telephone discussions of the OPG proposal :

Can CARE provide evidence of this project's replicability, and, is there assurance that the NIN will follow through with and expand upon the activity generated by this project?

The NIN and CARE have discussed at considerable length the support and role of the NIN in this project. During a joint meeting on June 4, 1975, CARE and the NIN agreed to and outlined (a) the part-time participation of seven of their personnel in the Divisions of Applied Nutrition and Nutrition Education; (b) the full-time participation of two additional NIN personnel, one beginning in July '75 and one in Jan '76; and (c) the assistance of two third-year students of the Superior School of Nutritional Sciences, as part of their "stage".

The NIN agreed to sponsor the two Peace Corps Volunteers involved in the project.

The NIN also pledged to continue and to expand nutrition education activities using the model which this project will establish. They indicated their intention to implement such programming in Siliana, Jendouba, Ain Draham, Bargou, Tabarka, and Le Kef.

Dr. Kallal said he intended to write directly to US AID expressing his support of this project and his desire to see it approved for funding under the OPG grant.

CR/NH/hh. 6/5/75.

TRANSLATION

REPUBLIC OF TUNISIA
MINISTRY OF PUBLIC HEALTH
National Institute of Nutrition
and Food Technology
11, rue Aristide Briand
(Bab Saâdoun)
T u n i s

Letter # 864/DI

June 10, 1975

The Director of the National
Institute of Nutrition

to

The Director of USAID
T U N I S

SUBJECT: Pilot Project for Nutrition Education to be undertaken in Tunis Sud, and later in other regions of Tunisia

Following a meeting held on Wednesday, June 4, at the National Institute of Nutrition and attended by our staff, Mr. Brand of CARE/MEDICO, and two members of the Peace Corps, Miss Reeser and Miss Hynes, I am writing to you to inform you that the National Institute of Nutrition is very interested in the prospect of undertaking a nutrition education project in the region of Tunis Sud in collaboration with CARE/MEDICO.

As you well know, it is the policy of our specialized Institute to allow any international organization to use our infrastructure and personnel as a working platform in close collaboration with us, after consultation and consent of the Director, for

- the opportunity to undertake research
- advice
- supervision

We ask no more than to undertake all work related to nutrition in close collaboration with interested organizations, and that the personnel designated by the organization in question work with us toward a common goal; the location of assignment of this personnel matters little.

I hereby request that you kindly study the possibility of assuring funding of the above-mentioned project by USAID.

The implementation of this project will be subsequently extended to other regions such as:

- the region of Siliana
- the region of Bargou
- the region of Ain Draham
- the region of Rades

Sincerely yours,

(Signed)
Professor Z. Kallal

cr/gmbh