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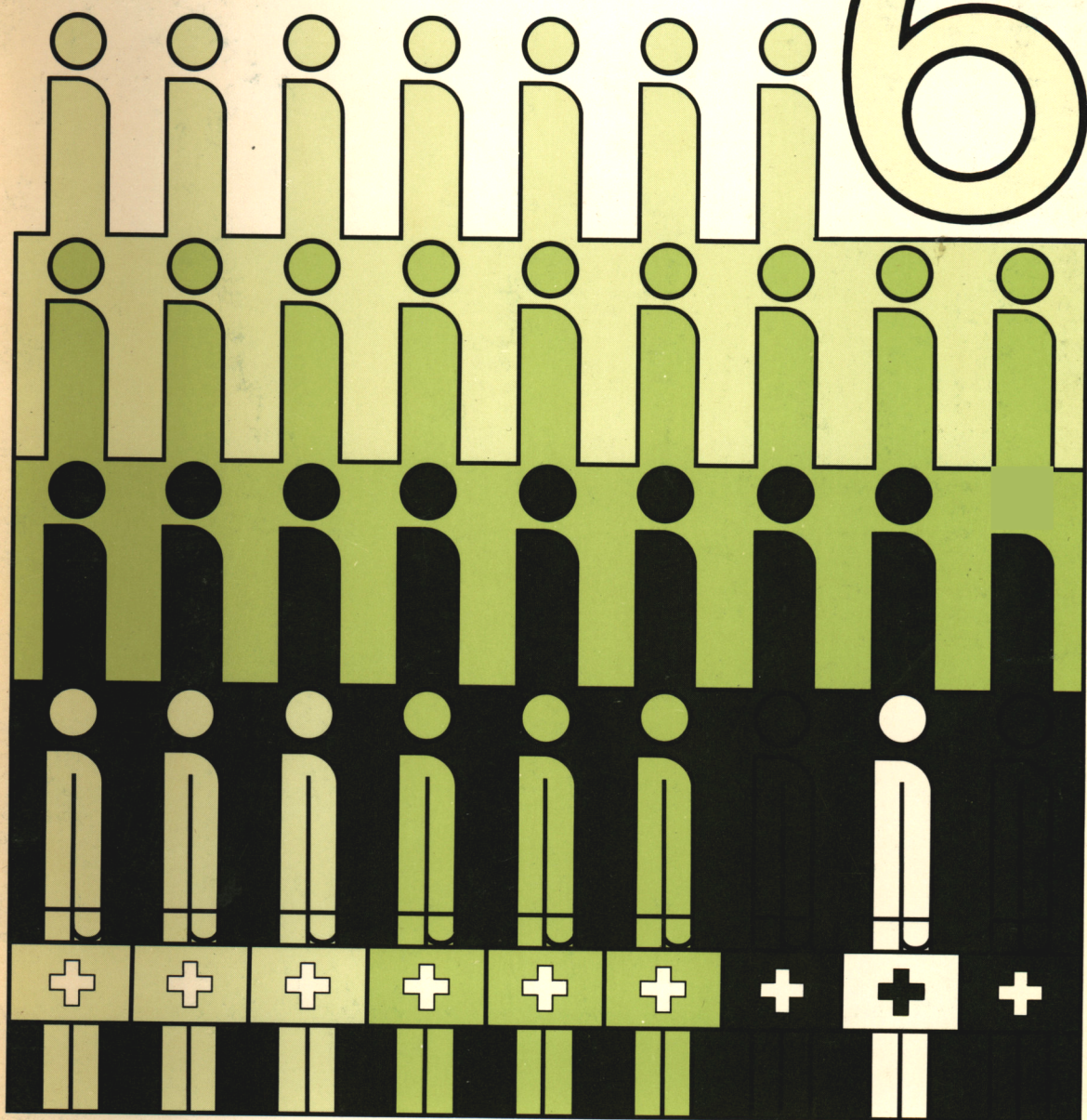
SALUS: LOW-COST RURAL HEALTH CARE AND HEALTH MANPOWER TRAINING

an annotated bibliography with special emphasis on developing countries

Editor: ROSANNA M. BECHTEL

VOLUME

6



SALUS: LOW-COST RURAL HEALTH CARE AND HEALTH MANPOWER TRAINING

**An annotated bibliography with special emphasis on
developing countries**

Volume 6

Editor: Rosanna M. Bechtel

**Abstracts written by: Rosanna M. Bechtel, Hope Cadieux-Ledoux, Anita Firth,
Frances Morgan, and David Paul-Elias**

(This is the sixth in a series of annotated bibliographies on low-cost rural health care and health manpower training. These volumes are published irregularly.)

The International Development Research Centre is a public corporation created by the Parliament of Canada in 1970 to support research designed to adapt science and technology to the needs of developing countries. The Centre's activity is concentrated in five sectors: agriculture, food and nutrition sciences; health sciences; information sciences; social sciences; and communications. IDRC is financed solely by the Parliament of Canada; its policies, however, are set by an international Board of Governors. The Centre's headquarters are in Ottawa, Canada. Regional offices are located in Africa, Asia, Latin America, and the Middle East.

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Postal Address: Box 8500, Ottawa, Canada K1G 3H9
Head Office: 60 Queen Street, Ottawa

Bechtel, R.M.

IDRC, Ottawa CA

IDRC-153e

SALUS: low-cost rural health care and health manpower training : an annotated bibliography with special emphasis on developing countries. Ottawa, Ont., IDRC, 1980. 157 p.

/IDRC publication/, /annotated bibliography/, /health services/, /public health/, /rural areas/, /paramedical personnel/, /developing countries/ — /vocational training/, /medical education/, /health education/, /health planning/, /family planning/.

UDC: 016:613

ISBN: 0-88936-249-1

Microfiche edition available

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Preface

Many publications that are distributed internationally, including this bibliographic series, are written in English, the authors or editors optimistically assuming that most potential users, whatever their country of origin, will have at least a reading knowledge of that language. We would like, however, to take this opportunity to translate into French and Spanish some of the information concerning SALUS and IDRC that was contained in previous English prefaces to ensure that we are getting our message across.

A nos lecteurs francophones

La présente série de bibliographies est préparée à l'aide du logiciel MINISIS conçu au Centre de Recherches pour le Développement International (CRDI) et opéré sur mini-ordinateur Hewlett-Packard 3000. Le programme SALUS ordonne les citations bibliographiques et résumés se rapportant aux documents choisis, les insère dans le chapitre approprié de la bibliographie, assigne les numéros de référence, et génère les index. Avec la publication de chaque volume, nous avons peu à peu construit une base de données, appelée SALUS, qui contient tous les enregistrements se trouvant dans les volumes publiés. A partir du volume 5, le nom de SALUS a été incorporé dans le titre de la bibliographie.

SALUS a pour complément une collection de documents cités dans les bibliographies, maintenant reproduits sur microfiche. Il nous est donc possible maintenant d'envoyer par la poste les copies sur microfiche de tout document demandé, à condition que le détenteur des droits d'auteurs nous ait accordé sa permission. Ce service, destiné au lecteur qui ne peut pas trouver le document original, sera plus rapide et compréhensif que celui qui était offert jusqu'à date. En effet, la pratique passée était de photocopier les documents d'une longueur inférieure à 30 pages. Toutefois, nous invitons nos lecteurs à se renseigner d'abord auprès des bibliothèques et librairies disponibles avant de faire usage des coupons placés à la fin de ce livre.

Les institutions oeuvrant dans le domaine de la santé et disposant du matériel approprié peuvent obtenir la base de données sur bande magnétique (en format ISO 2709), ainsi que la collection de microfiches et offrir ainsi un service questions-réponses complet à leurs utilisateurs. Nous serons, par ailleurs, heureux de coopérer avec ce type d'institutions, particulièrement celles qui ont des responsabilités sur le plan international ou dans le tiers-monde. Nous souhaitons également coopérer avec des institutions susceptibles de collecter ou contribuer des documents à SALUS. Il est à souhaiter qu'un organisme international compétent puisse (possiblement avec l'aide du CRDI) éventuellement prendre la responsabilité de ce système, le maintenir, et offrir les services aux utilisateurs soit directement, soit par l'entremise d'un réseau coopératif. Pour de plus amples renseignements, s'adresser à: *SALUS Project Manager, International Development Research Centre, P.O. Box 8500, Ottawa, Ontario, Canada K1G 3H9.*

A nuestros lectores de habla española.

Esta serie bibliográfica se produce utilizando un grupo de programas mecanizados (MINISIS) preparados por el Centro Internacional de Investigaciones para el Desarrollo

(CIID) para el mini-ordenador Hewlett-Packard 3000. El programa SALUS registra la cita y el resumen de cada documento en el capítulo apropiado, les asigna un número de referencia, y compila los índices. Con la publicación de cada volumen, hemos construido poco a poco una base de datos que contiene todas las citas incluidas en la serie publicada. Esta base de datos se llama SALUS y, empezando con el quinto volumen, este nombre se ha incorporado al título.

SALUS es complementada ahora por un archivo en microficha de los mismos documentos citados. De este archivo podemos enviarles a los lectores que de otra manera no podrían obtener un ejemplar de la obra original copias en microficha de cualquier documento que nos piden, con tal de que su distribución no sea restringida por los derechos de propiedad literaria. Este servicio será más rápido y más amplio que nuestra práctica presente de ofrecer fotocopias de documentos de menos de 30 páginas. Sin embargo, esperamos que nuestros lectores se remitan a sus bibliotecas y librerías locales antes de hacer uso de los cupones al final de este libro para pedirnos microfichas.

Los organismos que trabajan en el campo de la salud y que tengan los medios adecuados pueden aprovecharse también de la base de datos de SALUS, disponible en cinta magnética en el formato ISO 2709, y de la colección en microficha para proveerles a sus clientes servicios bibliográficos completos. Solicitamos correspondencia con estos organismos, sobre todo los de alcance internacional o situados en países en desarrollo. Además, quisiéramos cooperar con instituciones que podrían reunir o contribuir a SALUS con documentos de sus propias bibliotecas. Eventualmente, esperamos que una de estas instituciones podrá encargarse (posiblemente con el apoyo del CIID) de administrar el proyecto SALUS, mantener la bibliografía al día, y suministrar los servicios o directamente o a través de una red cooperativa. Para más información, haga el favor de dirigirse a: *SALUS Project Manager, International Development Research Centre, P.O. Box 8500, Ottawa, Ontario, Canada K1G 3H9*.

Mille remerciements à Marie-Paule Djoubou y muchas gracias a Rosa María Zanetti for their help with these translations. As always, I would like to thank the abstractors and particularly **Anita Firth** for assisting me with the in-house management of the SALUS project.

Rosanna M. Bechtel
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Abbreviations and Acronyms

ABU — Ahmadu Bello University, Zaria, Nigeria	IRHFP — Institute of Rural Health and Family Planning, Gandhigram, India
ALERT — All Africa Leprosy and Rehabilitation Training Centre, Addis Ababa	ITDG — Intermediate Technology Development Group, London
ANM — Auxiliary Nurse-Midwife	IUCD — Intrauterine Contraceptive Device
APHA — American Public Health Association, Washington, D.C.	IUD — Intrauterine Device
BCG — Bacillus Calmette-Guerin vaccine	KAP — Knowledge, Attitude, and Practice (Study)
CAHP — Coordinating Agency for Health Planning, New Delhi	KNIPOROS — Kenya-Netherlands-Israel Project for Operational Research in Outpatient Services, Kenya
CENDES — Centro de Estudios del Desarrollo, Venezuela	LRCS — League of Red Cross Societies, Geneva
CENTO — Central Treaty Organization, Ankara	MCH — Maternal and Child Health
CFNI — Caribbean Food and Nutrition Institute, Kingston, Jamaica	MEDLARS — Medical Literature Analysis and Retrieval Systems
CIDA — Canadian International Development Agency, Ottawa	MESH — Medical Subject Headings
CIIR — Catholic Institute for International Relations, London	NEAC — Nutrition Education Action Committee, Kingston, Jamaica
CMAI — Christian Medical Association of India, Bangalore	NIHAE — National Institute of Health, Administration, and Education, New Delhi
CMC — Christian Medical Commission, Geneva	NTIS — National Technical Information Service, Washington, D.C.
CPC — Carolina Population Center, Chapel Hill, N.C.	OAS — Organization of American States, Washington, D.C.
CSG — Capital Systems Group, Inc., Bethesda, Md.	OECD — Organization for Economic Cooperation and Development, Paris
CUSO — Canadian University Service Overseas, Ottawa	OEO — Office of Economic Opportunity, San Francisco
DANIDA — Danish International Development Agency, Copenhagen	PAHO — Pan American Health Organization, Washington, D.C.
DHEW — United States Department of Health, Education, and Welfare, Washington, D.C.	Russ. — Russian
DMEIO — District Mass Education and Information Officer (India)	SIDA — Swedish International Development Authority, Stockholm
DPT — Diphtheria, Pertussis, Tetanus vaccine	Span. — Spanish
Engl. — English	TBA — Traditional Birth Attendant
FAO — Food and Agriculture Organization, Rome	UCLA — University of California, Los Angeles
FP — Family Planning	UN — United Nations, New York
Fren. — French	UNDP — United Nations Development Program, New York
GPHCTC — Gondar Public Health College and Training Centre, Ethiopia	UNESCO — United Nations Educational, Scientific and Cultural Organization, Paris
HSMHA — Health Services and Mental Health Administration, Washington, D.C.	UNESOB — United Nations Economic and Social Office in Beirut, Beirut
IBRD — International Bank for Reconstruction and Development, Washington, D.C.	UNFPA — United Nations Fund for Population Activities, New York
ICA — Colombian Agricultural Institute, Bogota	UNICEF — United Nations Children's Fund, New York
IDR — Institute of Development Research, Copenhagen	UNROD — United Nations Relief Operations in Dacca
IDRC — International Development Research Centre, Ottawa	USAID — United States Agency for International Development, Washington, D.C.
ILO — International Labour Organization, Geneva	USGPO — United States Government Printing Office, Washington, D.C.
IPPF — International Planned Parenthood Federation, London	WHO — World Health Organization, Geneva

I Reference Works

- 3501 Biblioteca Regional de Medicina, Sao Paulo, Brazil. Saude rural/salud rural. (Rural health).** Sao Paulo, Biblioteca Regional de Medicina, Serie Bibliografica No.2, Sep 1977. 33p. Span., Portuguese.

This bibliography comprises 323 references to works on rural health in Latin America and the Caribbean that were published since 1960 in medical journals or by governments or specialized institutions. The references are grouped under these headings: socioeconomic aspects, medical care, health manpower development, infectious diseases, manuals and guides, nutrition, organization and programming, family planning, specific preventive interventions, and sanitation. An author index and a list of the periodicals that were used as sources are included. (HC-L)

- 3502 Brong-Ahafo Rural Integrated Development Programme, Kintampo, Ghana. DAWURO: newsletter of the Brong-Ahafo Rural Integrated Development Programme.** Kintampo, Ghana, Brong-Ahafo Rural Integrated Development Programme. Engl.

This newsletter features reports on the evaluation of various auxiliary personnel trained and deployed in the Brong-Ahafo Rural Integrated Development Programme, Ghana. It is noted: that traditional birth attendants, although slow to learn as a result of their age and illiteracy, appreciated their training and performed adequately by the end of the course; that the community clinic attendants were sometimes hampered by drug shortages and difficulties in obtaining their pay; and that the training of elementary and nursery school teachers (school first aiders) in hygiene, diagnosis, and first aid had resulted in improved environmental health in the schools and sometimes in the communities. Other items cover the opening of a new clinic, the launching of an anti-cholera campaign, and the rules and regulations of a new development resource centre. (HC-L)

- 3503 Colombia, Departamento Administrativo Nacional de Estadística. Registro de organismos de salud 1976. (Directory of health facilities, 1976).** Bogota, Departamento Administrativo Nacional de Estadística, Jul 1977. 95p. Span.

The 1st part of this booklet contains a series of graphs and tables that describe Colombia's health facilities (hospitals, clinics, health centres, etc.) in terms of type, location, source of financing, and number of beds as of 1976. The 2nd part lists the facilities by region and in

alphabetical order, giving the address and a codified description of each. (HC-L)

- 3504 Colombia, Ministerio de Salud Publica y Asistencia Social, Instituto Colombiano de Bienestar Familiar. Bibliografia sobre las publicaciones del Instituto Nacional de Nutricion y el ICBF. (Bibliography of the publications of the National Nutrition Institute and the Colombian Institute of Family Welfare).** Bogota, Ministerio de Salud Publica y Asistencia Social, Instituto Colombiano de Bienestar Familiar, Sistema Nacional de Bibliotecas, Oficina de Comunicaciones, Jan 1977. 2v. Span.

This 2-volume bibliography contains citations of the publications of the *Instituto Colombiano de Bienestar Familiar* (ICBF) and the *Instituto Nacional de Nutricion*, which was recently incorporated into the ICBF. In volume 1, entries are classified by subject headings, which are listed alphabetically; each entry includes classification number, author, title, publisher, place and year of publication, pagination, and a reference number. Volume 2 contains an alphabetical title index that gives the classification number and page assigned to each entry in volume 1. (RMB)

- 3505 Colombia, Ministerio de Salud Publica y Asistencia Social. Asociacion Colombiana de Facultades de Medicina, Division de Educacion, Bogota. Directorio nacional de programas docentes para la salud, 1973. (National directory of health training programmes, 1973).** Bogota, Ministerio de Salud Publica y Asistencia Social, Nov 1974. 91p. Span.

This directory constitutes a guide to basic courses and programmes available in Colombia for training physicians, administrators, laboratory personnel, nurses, pharmacists, dieticians, dentists and dental technicians, sanitation engineers and auxiliaries, occupational therapists and physiotherapists, etc. The 1st 2 chapters list the courses and programmes by sponsoring institution and subject area; the 3rd describes the principal characteristics of each, including year of inauguration, number of graduates to date, certificate or diploma offered, duration, admission requirements, and number of teaching staff. The 1st 2 chapters are referenced to the 3rd. (HC-L)

- 3506 Harrison, E.A., ed(s). National Technical Information Service, Springfield, Va. Rural health services; a bibliography with abstracts.** Springfield,

Va., National Technical Information Service, Dec 1977. 307p. Engl.

This bibliography is the result of a literature search of the US National Technical Information Services' (NTIS) 500 000-item collection of research and technical reports originating in federal departments, bureaus, and agencies. The bibliography contains citations and abstracts of 307 reports published from February 1976-November 1977 on primary health care, health planning, health care delivery systems, health resources, health care facilities, legislation, costs, and manpower. Also included are studies on health education, telemedicine, ambulatory health care, and mental health care in a rural setting. Ordering instructions and prices for further searches are given. (HC-L)

- 3507 Hiramani, A.B., Srivastava, U., Gill, M.** India, Directorate General of Health Services, Central Health Education Bureau. *Bibliography of behavioural studies and articles in sexually transmitted diseases in India*. New Delhi, Directorate General of Health Services, Central Health Education Bureau, n.d. 9p. Engl.
Unpublished document; appended to Research Findings (New Delhi), 9(3-4), Oct 1976-Jan 1977; see also entries 3845 and 4027.

Venereal diseases (VD) differ from other communicable diseases in that they represent a behavioural as well as a medical problem; an understanding of the psychosocial factors involved in their transmission is therefore essential to their control. This bibliography contains references to approximately 100 investigations into the behavioural aspects of VD that have been carried out in India over the past 15 years. They have been grouped under the following titles: epidemiological studies; what people know, believe, and do about sexually transmitted diseases; psycho-social factors; programme-oriented studies and articles; sex education; and general. There are no abstracts. (HC-L)

- 3508 Hornabrook, R.W., Skeldon, G.H.** Papua New Guinea Institute of Medical Research, Goroka, Papua New Guinea. *Bibliography of medicine and human biology of Papua New Guinea*. Faringdon, UK, E.W. Classey, Papua New Guinea Institute of Medical Research Monograph Series No.5, 1977. 335p. Engl.

This bibliography covers 3 913 publications of all types originating from Irian Jaya, the Solomon Islands, the New Hebrides, and New Caledonia as well as Papua New Guinea. Subject headings include bibliographies, anthropology, bacteriology, biographies, blood, child-bearing, demography, dental studies, disease states, entomology, environmental studies, epidemiology, nutrition, psychiatry, veterinary studies, etc. Each numbered entry contains author, title, date and place of publication, pagination, and the name of the journal or publisher. There are author, regional, and subject indices and a list of abbreviations of serials publications. (RMB)

- 3509 India, Department of Family Welfare.** *Centre calling*. New Delhi, Department of Family Welfare. Engl.

This quarterly publication of India's Department of Family Welfare states that it is concerned primarily with family planning; health-related articles, however, figure prominently among its features. A typical issue includes a report of the launching of the new nationwide health and family welfare campaign, a report of a child welfare programme, a report on the national programme for the prevention of blindness, a feature on water-borne diseases, and numerous smaller news items. The style is simple, straightforward, and informative and could be read with interest by health worker and layperson alike. (HC-L)

- 3510 Indo-Dutch Project for Child Welfare, Hyderabad, India.** *Newsletter*. Hyderabad, India, Indo-Dutch Project for Child Welfare. Engl.

In 1977, the Indo Dutch Project for Child Welfare started this newsletter to encourage local participation, especially of women, in their projects, which concentrate on nutrition and health education. State and UNICEF programmes are listed and comments are encouraged from parents, health auxiliaries, local leaders, and farmers, who are the principal audience. Certain articles are aimed specifically at each type of reader and health education lessons often appear in the context of a popular story describing commonplace events and customs. (RMB)

- 3511 Isquith, R.N.** *Health-related audiovisual aids for Spanish-speaking audiences*. Health Services Reports (Rockville, Md.), 89(2), Mar-Apr 1974, 188-202. Engl.

This annotated list describes over 120 audiovisual health education aids that are available in Spanish from various sources. The aids are grouped under these topics: accident prevention and occupational health, aging, community health, dental health, diseases and conditions, emergency health care, family planning, the human body and its development, mental health, alcoholism, drug abuse, migrant health, nutrition and food sanitation, personal hygiene, physical fitness, prenatal and infant care, and smoking and health. This list was compiled from the *Guide to Audiovisual Aids for Spanish-speaking Americans*, DHEW Publication No. (HSA) 74-30, which contains 207 principal entries and can be obtained by writing to Public Inquiries, Health Services Administration, 5600 Fishers Lane, Rockville, Maryland 20852. Some teaching aids are also available in other languages. (HC-L)

- 3512 Medecine Moderne et Medecine Traditionnelle, Paris.** *Pour en savoir plus. (For better knowledge)*. Medecine Moderne et Medecine Traditionnelle (Paris), 36, Jul 1977, 17. Fren.

This bibliography includes some 30 citations of recently published (mainly post-1970) books, theses, and articles on research that has been conducted into traditional African medicine and pharmacopoeia. It also indicates

a number of specialized reviews and organizations with an interest in the same subject. (HC-L)

- 3513 Sharma, P.C.** *Selected research bibliography on planning and delivery for rural health services.* Monticello, Ill., Council of Planning Librarians, Exchange Bibliography 1313, Jul 1977. 10p. Engl.

Approximately 150 references to books and articles that were published in the USA from 1940-1975 on the topic of rural health care delivery (including innovative delivery systems, the deployment of auxiliaries, care to minority or disadvantaged groups, socioeconomic and cultural aspects, etc.) are presented in alphabetical order. (HC-L)

- 3514 System Sciences, Inc., Bethesda, Md.** *Physician extenders; annotated bibliography.* Springfield, Va., National Technical Information Service, Dec 1976. 1v.(various pagings). Engl.

This bibliography contains annotations on 360 English-language articles and documents concerning physician extenders (principally nurse practitioners, physician's assistants, and medex) organized alphabetically by author. Each entry presents, in addition to author and title, source information and an abstract. Included in the bibliography are listings of the principal contents by individual articles, summary tables by content areas, and cross references of data. There are nine major content areas: policy, type of physician extender, type of degree, practice setting, medical specialty, type of care rendered, source of data, method of data collection, and geographical area. Over 95% of the classified articles deal with at least one policy issue regarding physician extenders; more than two-thirds are concerned with their impact on the health care system. (RMB)

- 3515 Vasco U., A., Ramirez Duque, H.** Colombia, Ministerio de Salud Publica y Asistencia Social. *Rediseño del sistema nacional de salud; compilación bibliográfica sobre el tema: "participación de la comunidad en general y en salud."* (Redesign of the national health system; bibliography on the theme: "community participation in general and in health"). Bogota, Ministerio de Salud Publica y Asistencia Social, Documento RSSC-8, 12 Nov 1973. 59p. Span.

See also entries 3581, 3653, 3654, 3655, 3657, and 3658.

The 461 items that appear in this bibliography were gathered as the basis for document RSSC-7 in this series, which deals with community participation in health programmes and activities. The items are presented in alphabetical order by author in the language of the original document; each entry contains the author, title, source, and a special code that indicates the library, agency, or institution from which the document may be obtained. The codes are listed at the end. (HC-L)

- 3516 WHO, Geneva.** *SI for health professions; prepared at the request of the Thirtieth World Health Assembly.* Geneva, WHO, 1977. 75p. Engl.

The Thirtieth World Health Assembly has recommended the worldwide adoption of the *Système Internationale d'Unites* (SI), an expanded version of the metric system. This 5-part handbook constitutes a succinct, authoritative introduction to SI and its practical application for the health profession. After a general description of the system, the practical application of SI units in medical practice and certain medical specialties is discussed, recommendations for standardizing laboratory reporting are summarized, and tables of equivalent values for traditional and SI units and conversion factors are presented. It is hoped that the handbook will simplify the transition to the new system and help to implement an international language of measurement. (HC-L)

- 3517 WHO, Geneva.** *Film catalogue/catalogue de films.* Geneva, WHO, n.d. 1v.(unpaged). Engl., Fren.

This catalogue of films on various aspects of health and preventive medicine covers numerous topics of interest in the developing countries: treponemal diseases, alcoholism, eye diseases, schistosomiasis, water resource development, tuberculosis, medical education, smallpox, dependency-producing drugs, environmental health, pollution, public health, cardiovascular diseases, family health, nutrition, immunization, and the work of WHO. The subject, date, producer, description, length, language(s), and distributor of each film are indicated and each is accompanied by a short summary of its content. Illustrations are frames from the films themselves. (HC-L)

II Organization and Planning

II.1 Health Manpower

See also: 3569, 3594, 3624, 3672, 3676, 3684, 3893, 3938, 3939, 3940, 3963, 3970, 3972

- 3518 Andrade, J.** Organizacion Panamericana de la Salud, Washington, D.C. *Participacion y responsabilidades en la planificacion de recursos humanos para la salud — el caso de Venezuela.* (Participation and responsibilities in the planning of human resources for health — the case of Venezuela). Washington, D.C., Organizacion Panamericana de la Salud, 1972. 12p. Span. Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973. Bound with entries 3521, 3541, 3632, and 4083 in entry 3534.

Various health-related institutions in Venezuela are responsible for health and health manpower planning; these include the Secretariat of Coordination and Planning, the Ministry of Health and Social Assistance, the Venezuelan Institute of Social Security, and the Ministry of Education. Because their spheres of influence frequently overlap, which has resulted in problems and duplication of effort, the Office for the Development of Human Resources for Health was created in 1972. Its functions in the fields of research and development, standardization, technical assistance, coordination with other government departments, and administration of the fellowship programme are outlined. (RMB)

- 3519 Cammaert, M.C.** Organizacion Panamericana de la Salud, Washington, D.C. *Disponibilidad de recursos humanos de enfermeria en America Latina.* (Availability of human resources in nursing in Latin America). Washington, D.C., Organizacion Panamericana de la Salud, 1973. 7p. Span. Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973. Bound with entries 3533, 3684, 3893, 3955, and 3970 in entry 3532.

Due to previous trial-and-error methods of health manpower planning, there is a chronic shortage of nurses in Latin America. Any methodology for projecting the supply and demand of nursing personnel should take into account these factors: the role of the nurse in health services delivery, not only in the hospital but also in primary care; nursing education and training programmes for auxiliary nurses; economic factors, in particular, low

salaries that encourage nurses to emigrate; and the nurse's image, which in Latin America is related to that of women in general. (RMB)

- 3520 Colombia, Servicio Nacional de Aprendizaje.** *SENA en el sector salud.* (SENA in the health sector). Bogota, Servicio Nacional de Aprendizaje, 1974. 1v.(various pagings). Span. Conferencia Panamericana sobre Recursos Humanos y Atencion Medica, Personal de Niveles Medio y Basico como Factor de Cambio en los Sistemas de Salud, Medellin, Colombia, 19-22 Jan 1975. Unpublished document.

Colombia's *Servicio Nacional de Aprendizaje* (SENA) aims to decrease unemployment and contribute to national development by training needed personnel. From 1967-1974, SENA undertook training programmes for auxiliary nurses in Bogota, Cali, Medellin, and Barranquilla; it also implemented programmes for training medical secretaries, hospital statistics auxiliaries, hospital equipment maintenance technicians, and pharmacy auxiliaries. This document explains the process whereby SENA identifies training needs, develops appropriate programmes, and evaluates students. The auxiliary nurse curriculum is appended. (HC-L)

- 3521 Confrey, E.** Organizacion Panamericana de la Salud, Washington, D.C. *Aspectos politicos de la planificacion de recursos humanos para la salud.* (Political aspects of planning human resources for health). Washington, D.C., Organizacion Panamericana de la Salud, 1973. 23p. Span. 24 refs. Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973. Bound with entries 3518, 3541, 3632, and 4083 in entry 3534.

With regard to health manpower planning, politics can mean more than the actions of political parties; they can also reflect the attitudes and influence of health professionals, the faculties of teaching institutions, members of medical societies, hospital administrators, and the general public. The author discusses the effect of these influences on health manpower planning, data collection, education and training, recruitment and development, distribution, utilization, and the creation of new types of health services. Suggestions are made to help health planners overcome political obstacles to new programmes. (RMB)

- 3522 Davis, R.A.** WHO, Brazzaville. *Development of basic health services*. Brazzaville, WHO, 20 Jun 1972. 22p. Engl.

The nursing component of the project for the development of basic health services in Kenya involved: a survey of rural health units, staff-to-workload ratios, and utilization patterns; an operational study of one health centre; and the formulation of job descriptions and curricula for various categories of nursing personnel. This document describes the findings and implementation of the studies, recounts the progress made toward the development of nurses' job descriptions and curricula, and presents statistics relevant to nurse manpower planning in Kenya. It is recommended that three training programmes for nurse auxiliaries be merged into one for multipurpose community nurses. (HC-L)

- 3523 Duque R., L.E., ed(s).** Federacion Panamericana de Asociaciones de Facultades de Medicina, Bogota. *Recursos humanos y salud. (Human resources and health)*. Bogota, Federacion Panamericana de Asociaciones de Facultades de Medicina, 1975. 174p. Span. Refs.
Conferencia Panamericana sobre Recursos Humanos y Atencion Medica, Personal de Niveles Medio y Basico como Factor de Cambio en los Sistemas de Salud, Medellin, Colombia, 19-22 Jan 1975.

This report contains the five papers presented at the 1975 Pan American Conference on Human Resources and Medical Care. Topics covered include the present state of health manpower training and health care coverage in Latin America and the objectives of the conference, the concept of the health team within the context of the developing country, the application of a system analysis approach to the development of curricula for new types of health worker, a strategy for formulating policies regarding health personnel, and summaries of the discussions that took place at the conference. The last section lists the background documents used during the conference. (HC-L)

- 3524 Fernando Duque, L.** Federacion Panamericana de Asociaciones de Facultades de Medicina, Bogota. *Conferencia Panamericana sobre Recursos Humanos y Atencion Medica; borrador de relato general. (Pan American Conference on Human Resources and Medical Care; draft of the general report)*. Bogota, Federacion Panamericana de Asociaciones de Facultades de Medicina, 1975. 13p. Span.
Conferencia Panamericana sobre Recursos Humanos y Atencion Medica, Personal de Niveles Medio y Basico como Factor de Cambio en los Sistemas de Salud, Medellin, Colombia, 19-22 Jan 1975.
Unpublished document.

Representatives from Latin American ministries of health, medical and health sciences faculties, social security institutions, and interested national and international organizations met to discuss problems related to human resources and health care coverage. Participants

recognized the need to raise the quantity and quality of middle- and basic-level health workers and discussion focused on how best this can be accomplished. This report summarizes the ideas put forward at the conference and sets forth a number of recommendations for cooperative action at the regional, national, and local levels. (HC-L)

- 3525 Golladay, F.L.** Organizacion Panamericana de la Salud, Washington, D.C. *Sustitucion de los medicos por personal de salud complementario; un analisis de los metodos y resultados. (Substitution of health auxiliaries for physicians; an analysis of the methods and results)*. Washington, D.C., Organizacion Panamericana de la Salud, 1973. 25p. Span.
Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973.

Bound with entries 3537 and 3540 in entry 3531.

Three methods for analyzing the opportunities to substitute one type of health personnel for another in outpatient care are examined; these are the Joel Kovner, the Uwe Reinhardt, and the Golladay-Smith models. This type of analysis can be helpful in health manpower planning to ensure that training programmes are designed to produce the most useful and economical type of health worker. These methods could also be applied to hospital and specialist care. Statistical data are included. (RMB)

- 3526 Johnson, T.L.** *Improving delivery of health care; the case of a Nigerian maternity hospital*. Nigerian Medical Journal (Lagos), 7(2), 1977, 234-237. Engl. 14 refs.

Statistical analysis of productivity in a maternity hospital in Lagos, Nigeria, revealed that over half of all births take place at night and that the greatest number occur during the 2nd quarter of the year. Roster records show, however, that 80% of the doctors work the morning shift while only 10% work the afternoon and night shifts, respectively; also, no monthly change in staffing pattern is evident. It is suggested that doctors could be utilized more effectively if they were scheduled according to hospital productivity with auxiliary staff supplementing their efforts during non-peak periods. (HC-L)

- 3527 Katz, F.M.** WHO, Geneva. *Guidelines for evaluating a training programme for health personnel*. Geneva, WHO, WHO Offset Publication No.38, 1978. 35p. Engl.

These guidelines provide an outline of the steps to be taken in planning and implementing the evaluation of an educational programme for health workers. The evaluator is expected to use his judgment to determine which of these steps are necessary for his own programme. The guidelines are presented under four headings corresponding to the phases of the evaluation: orientation, design of the evaluation, collection of information about the programme and its effects, and analysis and reporting. Each guideline presents possible

procedures and is followed in most instances by comments drawing attention to special problems. The annex contains suggestions for the application of the guidelines and is intended as an illustration of the procedures. (RMB)

- 3528 Maru, R.M.** *Health manpower strategies for rural health services in India and China, 1949-1975.* (Social Science and Medicine (Oxford, UK), 11(10), Jul 1977, 535-547. Engl. 65 refs. Originally published in Economic and Political Weekly (Bombay, India), 11(31-32), Special Number, Aug 1976.

Concentrating on medical education, distribution of medical personnel, and integration of auxiliary health workers, the author compares the development of health manpower policies in the People's Republic of China and India from 1945 to the present. Although they began with similar problems and resources, India has followed a "professional" model of health care while China has introduced a more "populist" approach that incorporates such changes as a shortened medical curriculum with emphasis on practical training, a preponderance of middle- and lower-level health workers, and the ready acceptance of traditional practitioners. However, barefoot doctors and other auxiliaries are not yet as well trained as their Indian counterparts. Neither country has been able to change the urban concentration of professional medical personnel, but China has established an effective referral system. (FM)

- 3529 Meisner, L., Parker, A.W., Austin, L., Orr, C., Ortega, M.L.** University of California, University Extension, Continuing Education in the Health Sciences, Berkeley, Cal. University of California, School of Health, Division of Public Health and Medical Administration, Berkeley, Cal. *Training program for consumers in policy-making roles in health care projects.* Berkeley, Cal., University of California, 1968. 40p. Engl.

See also entry 4071.

This article describes the training programme developed by the Berkeley Consumer Health Project for members of the policy-making boards of neighbourhood health centres. Part 1 deals with the background and organization of the health centres, states the objectives of the project, and lists the project staff. Part 2 is a narrative report of the project. Part 3 is an evaluation of the workshop programme, a key component of the project. Policy suggestions for future programmes and participant comments on the workshop programmes are contained in parts 4 and 5. (DP-E)

- 3530 Mola, G.** *Medical education and Chinese society.* Papua New Guinea Medical Journal (Boroko, Papua New Guinea), 20(2), Jun 1977, 84-88. Engl.

Twelfth Annual Medical Symposium, Lae, Papua New Guinea, 1976.

In 1976, the author toured the People's Republic of China for 18 days with a group from Papua New Guinea to observe the health services and medical training

facilities and programmes. He distinguishes between full-time, salaried health manpower and part-time, non-salaried workers such as barefoot doctors. Student selection criteria, training, and job descriptions for both categories are discussed. Principles of the Chinese system that the author would like to see adopted in Papua New Guinea are the use of the educational system to prepare children for a realistic way of life that includes respect for productive labour, the organization of young school leavers into a national service, and the elimination of the money objective from society. (RMB)

- 3531 Organizacion Panamericana de la Salud, Washington, D.C.** *Documentos de referencia, volumen 2: metodologias y sistemas de informacion.* (Reference documents, volume 2: methodologies and information systems). Washington, D.C., Organizacion Panamericana de la Salud, 1973. 1v.(various pagings). Span.

Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973.

See also entries 3532 and 3534; individual documents have been abstracted separately under entries 3525, 3537, and 3540.

Volume 2 of six documents from the Pan American Conference on Planning Human Resources in Health covers supply and demand, the focus of health manpower planning in Chile, mathematical models of health manpower planning, development of health models, determination of health manpower requirements on the basis of workload, and an analysis of methods and results of substituting health auxiliaries for physicians. Six additional papers listed in the table of contents are not included in this volume. (RMB)

- 3532 Organizacion Panamericana de la Salud, Washington, D.C.** *Documentos de referencia, volumen 3: oferta, distribucion y utilizacion del recurso humano.* (Reference documents, volume 3: supply, distribution, and utilization of human resources). Washington, D.C., Organizacion Panamericana de la Salud, 1973. 2v. Span.

Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973.

See also entries 3531 and 3534; individual documents have been abstracted separately under entries 3519, 3533, 3684, 3893, 3955, and 3970.

These 12 papers from the 1973 Pan American Conference on Planning Human Resources in Health deal with supply, distribution, and utilization of human resources. Subjects covered include: characteristics of health manpower training in Canada; availability of nursing manpower and nurse training in Latin America; coverage, employment, and the university; health manpower in Ontario; factors influencing the geographical distribution of physicians; utilization of new types of health manpower to extend health services coverage; environmental health manpower; health manpower in Cuba; emigration of physicians; and health manpower in the Americas. (RMB)

- 3533 Organizacion Panamericana de la Salud, Washington, D.C. Cuba, Ministerio de Salud. *Informe de la Republica de Cuba. (Report of the Republic of Cuba).*** Washington, D.C., Organizacion Panamericana de la Salud, 1973. 1v.(various pagings). Span.

Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973.

Bound with entries 3519, 3684, 3893, 3955, and 3970 in entry 3532.

The government of Cuba was encouraged to develop a national plan for health manpower training by fluctuations in available medical personnel, increased demand for health services, increased demand for staff for national health programmes, etc. The hierarchical infrastructure of Cuba's health services facilitated the formulation of this plan, which has led to the redistribution of health workers throughout the country, greater coverage, decentralization of services, standardized education, and greater emphasis on primary rather than hospital care. Statistical data are included in numerous appendices. (RMB)

- 3534 Organizacion Panamericana de la Salud, Washington, D.C. *Documentos de referencia, volumen 1: el proceso de planificacion de recursos humanos. (Reference documents, volume 1: planning human resources).*** Washington, D.C., Organizacion Panamericana de la Salud, n.d. 1v.(various pagings). Span.

Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973.

See also entries 3531 and 3532; individual documents have been abstracted separately under entries 3518, 3521, 3541, 3632, and 4083.

This 1st volume of documents from the Pan American Conference on Planning Human Resources in Health contains five papers on the planning process. These cover participation in and responsibilities for planning human resources for health in Venezuela, political aspects, the basis for the formulation of a national policy for human resources, the planning processes in Latin America, and the role of the university in health planning. (RMB)

- 3535 Pacheco de Souza, J.M. *Recursos humanos em saude publica. (Manpower resources in public health).*** Revista de Saude Publica (Sao Paulo, Brazil), 10(3), Sep 1976, 253-256. Portuguese. 13 refs.

The author recommends the creation of training courses for health personnel that would be shorter but at the same time more related to the needs of the Brazilian community. Lower-level health workers and traditional practitioners should be trained and incorporated into the system under proper supervision. He also proposes the establishment of a middle-level health worker, the health technician, whose job would correspond to that of

a feldsher, and of a university-trained public health professional who would not also be required to have a medical degree. (RMB)

- 3536 Parker, A.W. *Team approach to primary health care.*** Berkeley, Cal., University of California, University Extension, Neighborhood Health Center Seminar Program, Monograph Series No.3, Jan 1972. 53p. Engl. 34 refs.

This booklet advocates the team approach to primary health care. The 1st section describes what occurs at the primary care level, defines the concepts of the team and team approach, and discusses the benefits of this method. The author then proposes a structure for the team and discusses the interrelationships of team members with each other, with patients, and with other teams. Finally, experiences with similar endeavours are examined with a view to avoiding foreseeable problems. (DP-E)

- 3537 Reinke, W.A. Organizacion Panamericana de la Salud, Washington, D.C. *Requerimientos de personal de salud en base al contenido del trabajo. (Health manpower requirements based on work load).*** Washington, D.C., Organizacion Panamericana de la Salud, 1973. 16p.Span.

Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973.

Bound with entries 3525 and 3540 in entry 3531.

This document describes two research projects carried out by the Johns Hopkins School of Public Health (Baltimore, Maryland, USA) in India and Nigeria to develop a methodology for measuring community health needs and determining how best to use available health manpower in programmes based on the real health needs of each country. The projects' design and results are set forth. The author points out ways in which the project methodology can be applied to health manpower planning and analyzes the results with regard to the distribution and functions of health manpower and the role of the health centre. (RMB)

- 3538 Riano-Gamboa, G., Sanin Calderon, J., Parra Mojica, C.I., Molina Passega, J. *Asociacion Colombiana de Facultades de Medicina, Bogota. Talleres de informacion y adiestramiento en salud materno infantil T.I.A.M.I. (T.I.A.M.I. workshops on maternal child health information and training).*** Bogota, Asociacion Colombiana de Facultades de Medicina, Division de Medicina Social y Poblacion, Jan 1976. 97p. Span.

A series of workshops on information and training in maternal child health (MCH) was held in Colombia to acquaint health staff with the concept of integrated MCH care and the planning, organization, and administration of MCH programmes. Using a multiplier effect, multidisciplinary teams formed at the central level prepared teams at the regional level to draw up and apply appropriate courses for all local health personnel. This document recounts the objectives, programmes, and evaluation of the central and regional workshops

and describes the content of and the comments received regarding the courses that have so far been conducted at the local level. (HC-L)

- 3539 Roman, S.A.** *Health manpower: planning without objectives.* Journal of the National Medical Association (New York), 69(5), May 1977, 351-354. Engl.

Health manpower development in the USA has, to date, focused on increasing the numbers of health personnel in the hope of increasing the availability of health services. So far, however, the correlation between increased personnel and increased services has proven weak and considerable wastage of funds and energy has been incurred. This paper points out that availability of health services is related to the socioeconomic distribution rather than the numbers of health personnel and recommends that health manpower needs be linked to specific services, that appropriate schedules of substitution between professional and nonprofessional categories be established, and that financial incentives for provision of priority services be applied. (HC-L)

- 3540 Sepulveda A., C., Cartes, A.** *Organizacion Panamericana de la Salud, Washington, D.C. Enfoque actual de la planificacion de los recursos humanos para la salud en Chile. (Present focus of health manpower planning in Chile).* Washington, D.C., Organizacion Panamericana de la Salud, 1973. 54p. Span. 29 refs.
 Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973.

Bound with entries 3525 and 3537 in entry 3531.

Chile's health manpower planning policies are considered in the context of a transitional society moving towards socialism. The data collected in the 1968 study of human resources is analyzed and the authors propose a revised methodology for health manpower planning based on sectoral processes of health planning in view of experience acquired in Chile during the last 2 years. Statistical data on population, projected demand for health manpower, distribution of health professionals, etc., are included. (Modified author abstract.)

- 3541 Sonis, A.** *Organizacion Panamericana de la Salud, Washington, D.C. Bases para la formulacion de una politica de recursos humanos a nivel nacional. (Basis for the formulation of a national policy for human resources).* Washington, D.C., Organizacion Panamericana de la Salud, 1973. 19p. Span.
 Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973.
 Bound with entries 3518, 3521, 3632, and 4083 in entry 3534.

Health manpower planning is dependent on both the health care system and manpower planning in general and encompasses not only the classification of health personnel but the relationships between the classes. The characteristics of a health manpower planning policy

and the elements to be considered in its formulation are discussed. Factors influencing the implementation of such a policy, i.e., social participation, recruiting, career structure and mobility, etc., are also examined. (RMB)

- 3542 World Hospitals, Oxford.** *Management training for developing countries.* World Hospitals (Oxford, UK), 13(1-2), Jan-Apr 1977, 4-5. Engl.
 Since 1961, the International Hospital Federation (IHF) has organized an annual 12-week course in London (UK) for senior hospital and health services administrators from developing countries. Although the IHF is willing to sponsor this course, it holds strongly to the opinion that basic training in management should be provided in the home country. With this in mind, the 25 members of the 1976 course were asked to take part in a group project aimed at identifying the main problems hindering the development of better administration and management in hospitals and health services in their own countries and suggesting ways in which the system of management training could be improved to overcome these problems. The participants were divided into three groups according to their countries' GNP, level of development, etc., and asked to submit a report. Presentation of the reports was followed by spontaneous discussion during which the following needs were identified: a firm commitment on the part of governments to management training programmes; a clearer definition of the roles and responsibilities of medical and nonmedical administrators and well-defined career structures for both; basic training programmes for lower and middle, as well as top, management at the country level; simple training packages and manuals for teaching basic management techniques; recognition on the part of senior managers of the responsibility of training junior staff; and professional associations of managers and administrators. The IHF hopes that this work will stimulate further thought and action and would be interested in receiving reports on interesting innovations or developments in management training programmes in developing countries. (HC-L)

II.2 Organization and Administration

See also: 3506, 3513, 3528, 3658, 3662, 3672, 3680, 3810, 3842, 3860, 3865, 3867, 3948, 4007

- 3543 Amadeo Herrera, N.** *Servico social; objetivos, funcoes e atividades em uma unidade sanitaria. (Social services; objectives, functions, and activities of a health unit).* Revista de Saude Publica (Sao Paulo, Brazil), 10(2), Jun 1976, 209-216. Portuguese.

From the preliminary experiments carried out in a Sao Paulo (Brazil) experimental public health centre, four basic functions of the social service in an experimental public health unit became evident: delivery of health care, administration, professional training, and research. Besides these functions, its objectives and activities as well as its main attributes were determined. Although based on studies performed in an academic

centre, the study's applications for other public health units should also be valid. (Modified journal abstract.)

- 3544 Araujo dos Santos, V.** Universidad del Valle, Cali, Colombia. Federacion Panamericana de Asociaciones de Facultades de Medicina, Bogota. *Programa de adestramento em atencao materno-infantil simplificado. (Training programme in simplified maternal child health care).* Cali, Colombia, Universidad del Valle, Division de Salud, Oct 1974. 81p. Portuguese. 8 refs.

Taller Internacional sobre el Desarrollo de Modelos Simplificados de Atencion Materno-Infantil, Cali, Colombia, 25 Nov-1 Dec 1974.

The author discusses available maternal child health services in Latin America and outlines a programme designed to: reduce infant mortality by 50% in 5 years; reduce child mortality, morbidity, and malnutrition; provide adequate care for low birth weight babies; reduce maternal mortality by 80% in 5 years; provide family planning and antenatal and postpartum care; and combat illegal abortionists. The project's organization and methodology are described and the activities necessary for achieving each of the programme's goals are listed. Statistical data are included. (RMB)

- 3545 Benyoussef, A., Christian, B.** *Health care in developing countries.* Social Science and Medicine (Oxford, UK), 11(6-7), Apr 1977, 399-408. Engl. 22 refs.

Health care at the peripheral level consists of simple, effective measures founded on appropriate technology and traditional practices, utilizing local resources and manpower but integrated into a larger network. This paper examines the peripheral health care programmes in the People's Republic of China, Tanzania, Venezuela, Iran, India, Cuba, Niger, and the Sudan. These programmes have not yet been evaluated but each has successfully served some deprived population. (Modified journal abstract.)

- 3546 Benyoussef, A.** *Health service delivery in developing countries.* International Social Science Journal (Paris), 29(3), 1977, 397-418. Engl. 39 refs.

The author reviews recent work dealing with methodological and technical issues in health and development and presents examples of the use of social sciences, including health demography and economics, and their application to health services delivery. Two WHO studies, one investigating health services utilization in Tunisia and the other the effect of urban migration on health in Senegal, and the health care systems of the People's Republic of China, Tanzania, Venezuela, Cuba, Niger, and the Sudan are described. The author recommends further research into primary health care to see if it is continuously and universally viable. (RMB)

- 3547 Bhatia, J.R.** *Health services system in Syria.* NIHA Bulletin (New Delhi), 10(1), 1977, 5-12. Engl.

This paper briefly describes Syria's geographical and political features, health problems, medical and public health services, health services administration, training facilities, and statistical health indicators. Foremost among the obstacles to the development of health services in that country are the reluctance of physicians to accept full-time work with government agencies, physician emigration, low status of nursing as a profession, lack of communication between specialists trained in different countries, and an inadequate statistical basis for health planning. (HC-L)

- 3548 Bourgeade, A., Maestracci, D., Nguemby N'bina, C., Camps-Quelen, A.** *Approche sanitaire en Guyane francaise. (Health approach in French Guyana).* Medecine d'Afrique Noire (Paris), 24(11), Nov 1977, 737-740. Fren.

The administration of health services in French Guyana and the health status of the population are discussed. A relatively short life expectancy, a high level of child mortality, a falling birth rate, a weakening of family structures, unemployment, and urbanization are some of the major problems. Tuberculosis and malaria are the most serious diseases, often reaching epidemic proportions. Leprosy, venereal diseases, parasitic diseases, and alcoholism are also prevalent. Rural health services are inadequate and medical personnel are concentrated in urban areas. Preventive medicine, child health, health education, and the training of professional and paramedical personnel must be the country's future priorities. (FM)

- 3549 Brasil, Ministerio de Saude. Estado de Minas Gerais, Secretaria da Saude, Brasil.** *Sistema regional de saude do norte de Minas Gerais; desenho do modelo. (Regional health system in northern Minas Gerais; design of the model).* Sao Paulo, Ministerio de Saude, Instituto de Preparo e Pesquisa para o Desenvolvimento de Assistencia Sanitaria Rural, n.d. 35p. Portuguese. Seminar on Innovative Health Systems in Latin America, New Orleans, La., Aug 1973.

Unpublished document; also available in English. This report presents the project model for a low-cost health care delivery system infrastructure intended to make the fullest possible use of resources already existing in the state of Minas Gerais, Brazil. The administrative and social aspects of the system are discussed and the demographic, institutional, and health problems are outlined. The design and objectives of the system are presented and utilized with the ultimate goal of reproducing the model in other areas of the country. Copious statistical data are included. (RMB)

- 3550 Braunstein, M.E.** *Improvement of Israeli emergency medical services for better primary health care.* Ottawa, Canadian Public Health Association, 24 May 1978. 1v. (various pagings). Engl. Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26

May 1978.

Unpublished document.

Emergency medical services in Israel are provided mainly by an ambulance service operated by a private voluntary health agency. The service has efficient, well-equipped vehicles manned by well-trained drivers. However, there is a shortage of medical personnel to accompany these vehicles, largely because public funds are not readily available for this purpose. Given the generally high "health awareness" among Israelis, providing paramedics and making the public aware of the availability and capability of the service should provide Israel with model emergency care. A 6-page reference paper is included. (DP-E)

- 3551 Bridgman, R.F., Roemer, M.I.** WHO, Geneva. *Hospital legislation and hospital systems.* Geneva, WHO, WHO Public Health Papers No.50, 1973. 233p. Engl.

In most countries, the hospital is a central feature of the national health service and in many it accounts for a high proportion of the cost of that service. For this reason, WHO sponsored a survey of hospital legislation and systems of hospital organization. On the basis of information obtained from an analysis of the responses of 52 member states to a questionnaire (included in the annex), the authors present a classification of the major systems of hospital organization in current use, describe in detail hospital systems of selected countries, and outline general trends in health care. Examples of hospital systems include localized (Peru, Israel, USA), partially centralized (Philippines, Iran, Chile, France, Sweden), and highly centralized models (Togo, Malaysia, Bulgaria, USSR, and UK). (RMB)

- 3552 Byrd, B.F.** *Health care in China; "a look at the flowers from a running horse."* Tennessee Medical Association Journal (Nashville, Tenn.), 70(11), Nov 1977, 813-815. Span.

An American doctor visited hospitals and witnessed field activities devoted to the treatment, detection, and prevention of some of the commoner forms of cancer in the People's Republic of China. In this paper, he describes the campaign against esophageal cancer in the Linhsien region and the role of the barefoot doctor within it. (HC-L)

- 3553 Calvo, C., ed(s).** Cuba, Ministerio de Salud Publica, Direccion General de Estadistica. *Anuario estadistico, Ministerio de Salud Publica, 1974.* (Statistical yearbook, Ministry of Public Health, 1974). Havana, Editorial Orbe, Instituto Cubano del Libro, 1975. Iv.(various pagings). Span.

This statistical yearbook has been compiled with an eye to encouraging research and perfecting the Cuban data collection system. Statistical data are presented on the country, the organization of the health services, population, birthrate, mortality, morbidity, health care facilities, available hospital beds, obstetric and pediatric hospital services, physicians and their specialties, health manpower training, and child health. (RMB)

- 3554 Castellanos Robayo, J.** *Improved health coverage, coordination of health care levels and primary health care.* Bulletin of the Pan American Health Organization (Washington, D.C.), 11(3), 1977, 195-205. Engl. 14 refs.

The concepts of "levels of care" and "primary care" are examined in detail. The concept of levels implies recognition of the varying health needs of individuals and groups and the greater or lesser technological complexity of the methods and resources needed to cope with them. Levels of care are discussed in terms of accessibility, classification criteria, operative characteristics, and regionalization of services. Primary care is defined in developing countries as the health care given to rural populations in remote areas where health workers are scarce, the population is scattered, and most care is provided by auxiliary personnel. The primary care approach is described in terms of operative content, manpower resources, and administrative structure. (RMB)

- 3555 Castillo, C.E.** *Comentarios sobre algunos aspectos de la atencion medica en la Republica Popular China.* (Comments on some aspects of medical care in the People's Republic of China). Revista Venezolana de Sanidad y Asistencia Social (Caracas), 40(2), Jun 1975, 349-362. Span.

A US pediatrician's impressions of a 3-week visit to the People's Republic of China are recounted. The itinerary included visits to teaching hospitals, research institutions, specialist (pediatric and orthopaedic) hospitals, and rural and urban general hospitals; several operations were witnessed and numerous patients observed. Of notable interest were: the extensive use of acupuncture, moxibustion, and traditional herbal medicine alone or in combination with occidental methods; the use of acupuncture in place of general anaesthesia during operations; the shortened medical curriculum; and the childhood disease pattern, from which communicable diseases are now largely absent thanks to effective immunization programmes. (HC-L)

- 3556 Clifford, H.B.** *Models of primary health care in Kentucky.* Lexington, Ky., University of Kentucky, College of Medicine, Department of Community Medicine, 1978. 20p. Engl. 27 refs. Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978.

Unpublished document.

The state of Kentucky has a great variety of traditional and innovative organizations for the delivery of primary health care. This article describes five models of primary health care in the state and compares and contrasts them in some detail, including such topics as founder, date, location, philosophy, organization, staffing, accessibility, manpower utilization, community involvement, funding services, educational activities, etc. Also discussed are considerations necessary for using the Kentucky experience to develop similar systems elsewhere. (DP-E)

- 3557 Colombia, Departamento Nacional de Planeación. Documento síntesis del Programa de Concentraciones de Desarrollo Rural. (Summary of the Concentrated Rural Development Programme).** Bogotá, Departamento Nacional de Planeación, Documento URH-DBOS-037, 14 Jun 1973. 20p. Span.

The purpose of Colombia's Concentrated Rural Development Programme is to promote integrated economic and social development, coordinate existing social services, and strengthen mechanisms of social participation among rural populations. The health component of the programme will have as its principal targets the mother and child and as its primary objective the strengthening of basic health services (i.e., primary care and environmental health facilities). A process of regionalization will supply the rural areas with doctors, dentists, and other personnel on a regular basis and will ensure the training of the requisite number of permanent auxiliary staff. This document describes the programme's activities, administration, and financing. (HC-L)

- 3558 Colombia, Ministerio de Salud Pública y Asistencia Social, Instituto Nacional de Salud. Informe de actividades durante 1976. (Activities report for 1976).** Bogotá, Ministerio de Salud Pública y Asistencia Social, Instituto Nacional de Salud, Jul 1977. 142p. Span.

The 1976 annual report of Colombia's *Instituto Nacional de Salud* describes: the activities of the "Samper Martínez" National Health Laboratory in diagnosis, epidemiology, biomedical research, and control of chemical and biological products; the activities of the Division of Special Investigation; and the resources and accomplishments of the Division of Basic Rural Sanitation. Lists of publications put out by the divisions and the laboratory during 1974-1977 are included. (HC-L)

- 3559 Colombia, Ministerio de Salud Pública y Asistencia Social, Instituto Nacional de Salud. Informe de actividades durante 1975. (Activities report for 1975).** Bogotá, Ministerio de Salud Pública y Asistencia Social, Instituto Nacional de Salud, May 1975. 31p. Span.

The 1975 annual report of Colombia's *Instituto Nacional de Salud* briefly describes the activities of the "Samper Martínez" National Health Laboratory, the Division of Special Investigation, and the Division of Basic Rural Sanitation. Ten tables and three graphs describe the resources, expenditures, accomplishments (in terms of communities availed of water supplies and waste disposal), and projections of the last. (HC-L)

- 3560 Colombia, Ministerio de Salud Pública y Asistencia Social, Instituto Nacional de Salud. Informe de actividades durante 1974. (Activities report for 1974).** Bogotá, Ministerio de Salud Pública y Asistencia Social, Instituto Nacional de Salud, 1974. 1v.(various pagings). Span.

Colombia's *Instituto Nacional de Salud* comprises three divisions. The 1st, the "Samper Martínez" National Health Laboratory, is involved in scientific research, national epidemiological surveillance, manufacturing biological and chemical products for public health programmes, food and drug quality control, etc. The 2nd, the Division of Special Investigations, conducts research into the policies and needs of the Ministry of Public Health and the 3rd, the Division of Basic Rural Sanitation, is responsible for providing communities of less than 5 000 with water supplies and sewage disposal. This document briefly summarizes the work of the 1st two divisions and sets forward the accomplishments of the 3rd in greater detail. (HC-L)

- 3561 Colombia, Ministerio de Salud Pública y Asistencia Social, Instituto Nacional para Programas Especiales de Salud. INPES; informe de actividades, 1973. (INPES; activity report, 1973).** Bogotá, Ministerio de Salud Pública y Asistencia Social, Instituto Nacional para Programas Especiales de Salud, 1973. 58p. Span.

This 1973 annual report of Colombia's *Instituto Nacional para Programas Especiales de Salud* (INPES), renamed the *Instituto Nacional de Salud* in 1975, briefly describes its activities in rural sanitation, control of chemical and biological products, biomedical research, and applied research. Examples of the last include studies of dental resources, the effects of delegation of function on medical coverage, the epidemiology of Chagas' disease, occupational health in the textile industry, the financing of the health sector, and the demand for health and dental services. (HC-L)

- 3562 Colombia, Ministerio de Salud Pública y Asistencia Social. Reglamento de juntas administradoras de acueductos y alcantarillados rurales. (Regulations governing administrative boards of rural water supply and sewage systems).** Bogotá, Ministerio de Salud Pública y Asistencia Social, Instituto Nacional para Programas Especiales de Salud, Division de Saneamiento Básico Rural, Sección de Promoción, S.B.R.P. No.0060, May 1974. 1v.(various pagings). Span.

This manual sets forth the regulations governing the application of Colombia's rural sanitation programme at the community level. The 1st chapter defines the terms used in the regulations. The remaining 5 outline the regulations concerning the formation of general assemblies of users (i.e., all those subscribing to the services), organization and operation of the local administrative boards, functions of the local administrative boards and their members, employees of the administrative boards, and implementation, operation, and extension of services. Samples of nomination procedures, application and billing forms, etc., are appended. (HC-L)

- 3563 Consejo Superior Universitario Centroamericano, Programa Centroamericano de Salud, San Jose. Universidad de Costa Rica, Escuela de Trabajo Social, San Jose. Friedrich-Ebert-Stiftung,**

Bonn, Germany BDR. *Resumen final del seminario "Teoria y Practica de la Medicina Comunitaria en Centroamerica."* (Final summary of the seminar "Theory and Practice of Community Medicine in Central America"). Revista Centroamericana de Ciencias de la Salud (San Jose), 1(2), Sep-Oct 1975, 37-150. Span.

Seminario sobre Teoria y Practica de la Medicina Comunitaria en Centroamerica, La Catalina, Costa Rica, 12-16 May 1975.

Individual papers have been abstracted separately under entries 3567, 3582, and 4112.

Discussion during this seminar focused on three themes: community medicine in the Latin American context, a critical review of some experiments in community medicine in various countries, and community medicine as a factor of social change. This paper summarizes the participants' conclusions relevant to the three themes and community medicine in general and reproduces in full the 11 papers presented during this seminar. (HC-L)

3564 de Paula Carvalho, J.P. *Laboratorios de saude publica nos programas de saude.* (Public health laboratories in the health programme). Revista de Saude Publica (Sao Paulo, Brazil), 10(2), Jun 1976, 191-207. Portuguese. 17 refs.

After outlining the activities of public health laboratories in Brazil, the author discusses the role of the laboratory in public health and recent trends in the development of laboratory services. A scheme for the planning and organization of a hierarchy of public health laboratories is set forth, including a national laboratory, central laboratories in each state capital, affiliated specialized laboratories, regional and local laboratories, and rural health posts. Separate sections cover the technological processes to be carried out at each level, laboratory personnel and facilities, and a laboratory evaluation methodology. (RMB)

3565 Ekunwe, E. *Basic health services scheme in Nigeria.* Lagos, Institute of Child Health, May 1978. 5p. Engl.

Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978.

Unpublished document.

Under the Basic Health Services Scheme of Nigeria, the rural area will be divided into basic health units, each served by a comprehensive health centre, 4 primary health centres, 20 health centres, and 4 mobile clinics. The programme will deal mainly with mother and child care and will employ methods that have proved to be effective in similar but less comprehensive projects. The aim is to cover 60% of the population within 7 years and to keep expanding. An experimental project that contributed to the formation of the scheme is described. (DP-E)

3566 Fondiller, S. *Nineteen nurses visit People's Republic of China.* American Nurse (Kansas City, Mo.), 10(3), 15 Mar 1978, 5, 10. Engl.

The impression of a group of US nurses touring health facilities in the People's Republic of China are described. The trip included visits to a teaching hospital, a nurses' training school, and a deaf-mute school for children. The nurses witnessed demonstrations of acupuncture and collected information on administrative procedures and training requirements for nurses. They were especially interested in commune health care, which is characterized by the integration of traditional and Western medicine and by mass involvement in preventive medicine. The role of the barefoot doctor and the financial aspects of health care also received attention. (FM)

3567 Gandasegui, M.A. *Panama; la organizacion de la produccion de salud.* (Panama; organization of health care delivery). Revista Centroamericana de Ciencias de la Salud (San Jose), 1(2), Sep-Oct 1975, 97-108. Span.

Seminario sobre Teoria y Practica de la Medicina Comunitaria en Centroamerica, La Catalina, Costa Rica, 12-16 May 1975.

For complete proceedings see entry 3563.

In Panama, the health committees established by the Ministry of Health are the principal organizations for the promotion of community health and development. Other secondary organizations include the local magistrate's council, the grange, the commission for sectoral coordination, the federation of health committees, etc. For community health work the Ministry recommends a health team composed of social workers, health educators, communications experts, and social scientists as well as the usual medical personnel. These related professionals can help support the Ministry's three-pronged health education programme by concentrating on communications and the production of educational materials, education to help the individual acquire and adopt good health habits, and the organization and interaction of health-promoting institutions. (RMB)

3568 Gish, O., Boostrom, E.R., Franks, J.A., Powell, R.N. USA, Agency for International Development, Department of State. *Review of the health sector of Lesotho.* Washington, D.C., American Public Health Association, 1975. 65p. Engl.

Unpublished document.

The geography, government, economy, demography, educational system, and disease patterns of Lesotho are reviewed and the health care delivery system is analyzed in terms of historical background, organization, planning and administration, resources, distribution of facilities and manpower, utilization, preventive programmes, maternal child health, health manpower training, and finance. In the section on health planning, the 1st and 2nd national development plans, external assistance, and food aid are discussed. The authors' recommendations cover the planning structure and administration, manpower, the rural infrastructure, hospitals, nutrition, etc. (DP-E)

- 3569 Greenhill, S.** *Primary health care in developing countries — some of the problems.* Edmonton, Alta., University of Alberta, Department of Community Medicine, 22 Mar 1978. 14p. Engl.

Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978.

Unpublished document.

This paper deals with some of the problems of establishing primary health care services in developing countries. The author discusses the colonial history of the Third World, the political climate, training of medical personnel with emphasis on the inappropriate nature of Western curricula, and the training and use of nonprofessional health care workers and traditional healers and midwives. The paper is preceded by an outline of the contents. (DP-E)

- 3570 Guatemala, Ministerio de Salud Publica y Asistencia Social.** *Reunion de integracion del programa de fortalecimiento de salud rural a los servicios de salud de la region no.5. (Meeting on the application of the rural health strengthening programme to the health services in region no.5).* Guatemala City, Ministerio de Salud Publica y Asistencia Social, Direccion General de Servicios de Salud, 1973. lv.(various pagings). Span. Reunion de Integracion del Programa de Fortalecimiento de Salud Rural a los Servicios de Salud de la Region No.5, Quezaltenango, Guatemala, 1-11 Oct 1973.

Guatemala is attempting to strengthen its rural health services by increasing regional- and district-level support to local-level facilities (health posts). Papers presented at this meeting describe the implementation of this process in a specific region. Topics covered include the functions of the regional headquarters and its individual staff members, the organization of the health districts, the role of the mobile teams that offer technical and administrative support to rural health posts, the functions of and activities of a rural health post, and the organization of health activities at the local level. A detailed description of the regional health services infrastructure emerges. (HC-L)

- 3571 Hamlin de Zuniga, M.** *Association of community health services in Guatemala.* Chimaltenango, Guatemala, Behrhorst Clinic Foundation, Apr 1978. lv.(various pagings). Engl.

Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978.

Unpublished document.

This paper describes the events that led to the organization of the Association of Community Health Services in Guatemala. The Association, composed of private, voluntary health organizations, is an attempt by non-governmental agencies to unite and work together

toward the resolution of common problems in order to substantially improve the lifestyles of the people they serve. Appendices on structural and geographical facts and the philosophy, aims, and programmes of the Association are included. (DP-E)

- 3572 Hevia Rivas, P.** *Modelos de participacion de la comunidad en los programas de salud. (Models of community participation in health programmes).* Educacion Medica y Salud (Washington, D.C.), 11(3), 1977, 258-276. Span. 16 refs.

Latin American experiments in community participation reveal these minimum requirements for the establishment of interrelationships between local health agencies and the community: a local health system, a participating health team, respect for the community, contact with community organizations, and contact with private and governmental organizations at the local level. The author considers the effectiveness in Latin America of community health volunteers, local health and community development councils, and health brigades and stresses that active and organized community participation in health activities is the best guarantee of success in implementing integrated health programmes. (Modified journal abstract.)

- 3573 Hospital Practice, New York.** *In Papua New Guinea, health aides carry medical burden.* Hospital Practice (New York), Jul 1976, 89-104. Engl.

The evolution and organization of health services and health manpower in Papua New Guinea are discussed. Though evidence of traditional medicine remains, the emphasis has been placed on modernization. Rather than endorse individual private practices, the official government policy is to encourage health teams in which a doctor acts as supervisor to paramedics. Practical examples of the system are described, including a fully-equipped rural hospital, a health education centre, and an isolated health post. Family planning, malnutrition, venereal diseases, and kuru, a mysterious neurological disorder formerly spread by cannibalism, are some of the common problems dealt with at these centres. (FM)

- 3574 Mahler, H.** *International nursing; the meaning of primary health care.* Australian Nursing Journal (Melbourne), (5), Nov 1977, 22-25. Engl.

This paper discusses the distortions and inequities in current health care delivery systems in both developed and developing countries and sets down some of the characteristics of an appropriate primary health care system. Such a system would fit the life patterns of the community it serves, be fully integrated with other aspects of community development, assure consumer participation in formulating and carrying out health activities, make maximum use of available community resources, rely on the functioning of the health team concept, and discourage the proliferation of elitist, professional attitudes. (HC-L)

- 3575 Minde, M.** *History of mental health services in South Africa; part XV: the future of mental health services.* South African Medical Journal (Capetown), 51(16), 16 Apr 1977, 549-553. Engl.

Four recent developments in the reorganization of mental health services in South Africa are discussed. The 1st of these, the clinical control of mental hospitals by university psychiatry departments, should lead to improvements in the quality of mental health care and facilities. Second, the Smith Mitchell scheme of boarding out chronic patients in sanatoria should reduce the problem of overcrowding in hospitals. Third, the establishment of chairs of community medicine in all medical schools should bring about greater contact between psychiatric workers and the community. Finally, changes in forensic psychiatry will allow an independent panel of psychiatrists to give opinions, when necessary, on the mental state of an accused person in court. (FM)

- 3576 Mosley, W.H., Rahman, M.M., Chen, L., Aziz, K.M., Greenough, W.B.** *International research laboratory in Bangladesh.* Lancet (London), 18 Mar 1978, 602-603. Engl.

A brief description of the Cholera Research Laboratory in Dacca, Bangladesh, is presented. In its transformation from a joint USA-Bangladesh administration to an international centre governed by a majority of trustees from developing countries, it seeks to avoid expatriate dominance. Of the 598 staff members, 97% are Bangladeshi, many at senior levels. Moreover, most of its recent publications have been by Bangladeshi scientists. The centre's studies on cholera have led to effective treatment of severe diarrhea, the development of an intravenous fluid plant, and a new vaccine. Training of professional and auxiliary health workers is also part of the centre's programme. (FM)

- 3577 Obregon Gavida, V.M., ed(s).** Venezuela, Ministerio de Sanidad y Asistencia Social, Oficina de Publicaciones, Biblioteca, y Archivo. *Salud publica en el medio rural; organizacion de programas. (Public health in rural areas; programme organization).* Revista Venezolana de Sanidad y Asistencia Social (Caracas), 46, Sep-Dec 1976, Extraordinario, 405p. Span. Refs.

This special issue of the *Revista Venezolana de Sanidad y Asistencia Social* (Venezuelan Review of Health and Social Welfare) is devoted to health programmes operating in rural areas of the country. The issue first gives background information regarding present health status and resources available to the rural areas and then discusses both integrated and special programmes in terms of resources, planning, programming, budgeting, implementation, supervision, evaluation, and reporting systems. The final chapter puts forward some ideas concerning health policy and the restructuring of the Ministry of Health and Social Welfare. (HC-L)

- 3578 Paik, N.C.** WHO, Brazzaville. *Epidemiological services in Liberia; assignment report.* Brazzaville, WHO, 3 May 1973. 16p. Engl.

In order to promote and integrate the work of existing communicable disease control units in Liberia, a combined project under the title of Epidemiological Services was created in 1967. This report deals with the history of the project, including epidemiological services, project area, objectives, staff, and method. A separate section traces project development, which covers the establishment of an epidemiological and statistical unit, anticholera measures, leprosy control, the smallpox eradication and measles control programmes, the vital and health statistics component, the laboratory services component, and special studies on schistosomiasis, onchocerciasis, tuberculosis, Lassa fever, typhoid fever, influenza, intestinal parasites, yaws, poliomyelitis, and monkey-pox. Conclusions, recommendations, and statistical data are included. (RMB)

- 3579 Parker, A.W.** *Dimensions of primary care; blueprints for change.* In Andreopoulos, S., ed., *Primary Care: Where Medicine Fails*, New York, John Wiley, 1974, 15-77. Engl. 100 refs.

The author attempts to define the concept of primary care and examines some of the limited sources of primary care available in the USA today, such as comprehensive health care programmes, prepaid group practices, private physicians, outpatient departments, free clinics, and emergency rooms. Current strategies to increase the availability of primary care are presented; these include the production of primary care physicians, the use of physician assistants and nurse practitioners, preferential selection of medical students favouring minority and disadvantaged groups, the National Health Service Corps Programme, neighbourhood health centres, etc. A section containing 100 references is appended. Statistical data are included. (DP-E)

- 3580 Pugh, A.O.** *Aspects of rural health; I: introduction.* Central African Journal of Medicine (Salisbury), 24(2), Feb 1978, 35-37. Engl.

The organization of rural health services in Rhodesia is schematically presented. A fully-equipped hospital, staffed by a district medical officer, serves a population of up to 100 000. At the local level, rural hospitals are staffed by medical assistants or registered nurses and serve from 5 000-10 000 widely-scattered people. Village level care is provided by a family health agent, representing the district community health sister. In addition, village health workers are now being trained. Acceptance and active community participation is seen as the key to the success of this system, which should alleviate the problem of health services delivery in rural areas. (FM)

- 3581 Ramirez Duque, H., Cano Gaviria, E.** Colombia, Ministerio de Salud Publica y Asistencia Social. *Rediseño del sistema nacional de salud; resultados y propuestas del grupo de estudio numero 8: "centralizacion politica y descentralizacion administrativa."* (Redesign of the national health system; results and proposals of study group number 8: "political centralization and administrative decentralization"). Bogota,

Ministerio de Salud Publica y Asistencia Social, Documento RSSC-9, 12 Nov 1973. 34p. Span.
See also entries 3515, 3653, 3654, 3655, 3657, and 3658.

The redesign of Colombia's national health system is aimed at creating a mechanism that centralizes decision-making power in the highest level of the system while decentralizing policy administration and implementation in the lower levels. This document discusses the concepts of centralization, decentralization, and deconcentration and puts forward four alternative models of administration, each of which embodies a different mix of the above-mentioned concepts. (HC-L)

- 3582 Rodriguez Caldera, J., Casas Fernandez, G.** *Psiquiatria comunitaria en Costa Rica. (Community psychiatry in Costa Rica).* Revista Centroamericana de Ciencias de la Salud (San Jose), 1(2), Sep-Oct 1975, 109-114. Span.
Seminario sobre Teoria y Practica de la Medicina Comunitaria en Centroamerica, La Catalina, Costa Rica, 12-16 May 1975.
For complete proceedings see entry 3563.

After tracing the historical background of community mental health services in Costa Rica, the author lists the objectives of the 1974-1975 programme, whose ultimate goals are to alleviate crowding of the national psychiatric hospital, regionalize mental health services, preserve the continuity of these services, and incorporate appropriate persons and institutions into the system. The roles of the health sector, the educational sector, related groups and organizations, and local authorities in this process are described. (RMB)

- 3583 Salmon, J.W.** *Health services developments; innovative strategies in the People's Republic of China.* Journal of Allied Health (Thorofare, N.J.), 5(3), Summer 1976, 5-9. Engl. 11 refs.
An American visitor to the People's Republic of China briefly describes China's accomplishments in the realm of health and the changes in medical philosophy and education that made them possible. He notes that a number of concepts underlying the Chinese system, such as planning for the needs of the entire population, patient participation in both health campaigns and individual treatment, strong public health orientation in the training of all health workers, etc., hold potential significance for health planning in other countries. (HC-L)

- 3584 Secretaria Ejecutiva del Convenio Hipolito Unanue, Caracas.** *Cooperacion internacional en salud en el area andina, Convenio Hipolito Unanue. (International health cooperation in the Andean region, Hipolito Unanue Pact).* Caracas, Secretaria Ejecutiva del Convenio Hipolito Unanue, 5 CVSP-72, Oct 1976. 1v.(various pagings). Span. 11 refs.
Quinto Congreso Venezolano de Salud Publica, Una Politica de Salud para la Nueva Venezuela, Caracas, Venezuela, 9-16 Oct 1976.

The *Hipolito Unanue* pact has its roots in attempts at social and economic cooperation begun in the 1960s by the countries of the Andean region (Bolivia, Colombia, Chile, Ecuador, Peru, and Venezuela). The pact calls for inter-regional cooperation in many aspects of health and, in its final form, the formation of a permanent executive body with its own budget to implement its recommendations. This document describes the evolution and objectives of the pact and the organization and activities of its executive body. Annexes contain the text of the pact and related agreements, a list of publications proceeding from the pact, and some statistical information on the Andean region. (HC-L)

- 3585 Service Medical de la Communaute Baptiste de Zaire Ouest, Vanga sur Kwilu, Zaire.** *Rapport annuel 1977. (Annual report, 1977).* Vanga sur Kwilu, Zaire, Departement de Sante Publique, Hopital Evangelique, 1977. 8p. Fren.
Unpublished document.

The *Communaute Baptiste de Zaire Ouest* (CBZO) provides integrated medical services to a population of 300 000 in the zone of Bulungu, Zaire, through a network of 12 health centres and a number of subcentres. This 1977 annual report outlines the CBZO's activities and accomplishments in the areas of preschool health, antenatal care, family planning, environmental health, nutrition, vaccination, tuberculosis control, and auxiliary training. The report also describes the organization's efforts in the direction of financial self-sufficiency, presents the balance sheet for the year 1977, and sets forward its budget and targets for the year 1978. (HC-L)

- 3586 Servicio Seccional de Salud de Antioquia, Medellin, Colombia.** *Secretaria de Educacion, Salud y Bienestar Social de Medellin, Colombia. Instituto Colombiano de Seguros Sociales, Caja Seccional de Antioquia, Medellin, Colombia. Universidad de Antioquia, Escuela de Salud Publica, Medellin, Colombia. Colombia, Ministerio de Salud Publica y Asistencia Social. Organizacion Panamericana de la Salud, Washington, D.C. Planificacion de la salud en Antioquia: "Plansan"; proyecto 11, diagnostico del sector salud y analisis de sus instituciones Depto. de Antioquia. (Health planning in Antioquia: "Plansan"; project 2, diagnosis of the health sector and its institutions in the Department of Antioquia).* Medellin, Colombia, Universidad de Antioquia, Escuela de Salud Publica, Publicacion No.4, 1973. 595p. Span.

An in-depth study of the health sector and its most representative institutional components was undertaken in the department of Antioquia, Colombia. The study covered these aspects of the sector in general and the selected institutions: health legislation, financial capability, human resources, budget, productivity, and utilization. Numerous graphs and tables of data are scattered throughout and each section is followed by a summary in point form of its contents. (HC-L)

- 3587 Sidel, V.W., Sidel, R.** *Primary health care in relation to socio-political structure.* Social Science and Medicine (Oxford, UK), 11(6-7), Apr 1977, 415-419. Engl.

Fifth International Conference on Social Science and Medicine, Nairobi, Kenya, 8-12 Aug 1977.

Primary health care is both a reflection of a society's political, social, economic, and cultural history and current structure and, in some countries, a leading edge for change in that structure. After describing WHO's primary health care model, the authors examine the relationship between health care and socio-political structure in Sweden, the UK, the USA, the USSR, the People's Republic of China, and Chile. They conclude that the primary care model is strongest in countries where power and wealth have shifted to the lower classes and that tactics be developed to strengthen primary care in countries with unfavourable social structures. (Modified journal abstract.)

- 3588 Siegel, S.R.** *Inside Cuba; a U.S. dentist's view of dentistry under Castro.* Dental Survey (Minneapolis, Minn.), 51(10), Oct 1975, 64, 67-68, 70. Engl.

An American dentist on a 2-week visit to Cuban dental facilities reports that Cuba now has 1 stomatologist: 4 600 population and 1 operator:3 300 and that dental care has been extended to the entire population through: 2 years compulsory rural service for all new graduates; provision of refresher courses for rural stomatologists; the deployment of clinical dental technicians, dental assistants, prosthetic technicians, and dental equipment technicians; and an active, preventive/curative school dental programme. The ratio of fillings to abstractions is now 1:1 as compared to 1:8 in 1960; the school dental programme and a mass campaign on the ill-effects of sugar should further increase this ratio in favour of tooth preservation. (HC-L)

- 3589 Sondhi, P.R.** *Rural health services in Haryana.* Nursing Journal of India (New Delhi), 68(3), Mar 1977, 87. Engl.

The development of rural health services in Haryana, India, since 1966 is discussed. The importance of community participation and the relationship between health and economic development are stressed, especially in continuing education programmes. In providing comprehensive basic health care, the state plan introduced the concept of the multipurpose worker — 2 for every 5 000 people, backed up by dispensaries and 1 physician:25 000 population. A social worker or *dai* is also part of the scheme to provide liaison between the community and government officials. Increases in hospital construction and coverage by qualified medical personnel have been spectacular. (FM)

- 3590 Szereday, Z.** WHO, Brazzaville. *Maternal and child health and family planning; final report.* Brazzaville, WHO, 13 Dec 1974. 73p. Engl.

In 1971, WHO initiated a 5-year project in the islands of Mauritius and Rodrigues to reorganize and strengthen existing maternal and child health (MCH)

services with the addition of family planning (FP) services. Basic data are presented on population policy, health services organization, health administration and legislation, and the health situation. The section on project development covers statistical aspects, traditional birth attendants (*dais*), supervision, training, health education, etc. Conclusions and recommendations are included. Annexes contain information on birthrate, mortality, population increase, MCH/FP activities in Rodrigues, an organizational chart of MCH/FP services, vaccinations in Mauritius, and a proposal for training *dais*. (RMB)

- 3591 USA, Department of Health, Education, and Welfare.** *Community health representative programs in the Puget Sound Service Unit.* Seattle, Wash., Indian Health Service, Puget Sound Service Unit, Aug 1975. 6p. Engl.

Unpublished document; see also entries 3592, 3833, 3902, 3903, 3906, 3918, 3921, 3922, 3923, 3930, 3931, 3932, 3933, 3934, 3935, 4032, 4050, 4051, 4085, and 4100.

Recent developments in the community health representative (CHR) programmes in the Puget Sound Service Unit of the US Indian Health Service include: a 43% increase in the number of CHRs employed by the tribes; the development of maternal and child health and health maintenance clinics; the hiring of specialized staff to deal with problems such as mental illness, drinking, and drug abuse; the initiation of activities for senior citizens; the support of ongoing educational activities for CHRs; and the increased involvement of the Indian population in health planning at the regional, county, and state levels. It is concluded that the CHRs have succeeded in identifying and filling health needs in the community. (HC-L)

- 3592 USA, Department of Health, Education, and Welfare.** *Expanding tribal dialogues; a report on the fiscal year 1974 community health representative contract negotiations and renewals.* Seattle, Wash., Indian Health Service, Puget Sound Service Unit, Health Education Branch, Jun 1973. 1v.(various pagings). Engl.

Unpublished document; see also entries 3591, 3833, 3902, 3903, 3906, 3918, 3921, 3922, 3923, 3930, 3931, 3932, 3933, 3934, 3935, 4032, 4050, 4051, 4085, and 4100.

At the end of the fiscal year 1973, the Western Washington (now Puget Sound) Service Unit of the US Indian Health Service decided to make community health representative (CHR) contract renewals a project designed to encourage tribes to actively engage in CHR programme planning. To this end, a series of workshops and meetings was held to acquaint them with contract, budgeting, and negotiation requirements and to elicit from them complaints, suggestions, and programme submissions suited to their respective needs. This report describes the mechanisms by which the tribes were involved in the contract renewals and the results of this involvement. (HC-L)

- 3593 van Mazijk, J.** *Health care in the interior of the Republic of Surinam.* In *Alternatives in the Delivery of Health Services*, Mona, Jamaica, University of the West Indies, Department of Social and Preventive Medicine, 1976, 57-64. Engl. Seminar/Workshop on Alternatives in the Delivery of Health Services, Castries, St. Lucia, 8-12 Nov 1976.

For complete document see entry 3012 (volume 5).

This article describes the organization of health services in the interior of the Republic of Surinam. A private hospital, three church groups, and the government collaborated in setting up missions or health districts called resorts. The organization, personnel, facilities, and functions of the health districts are discussed. The article concludes with descriptions of training courses for various workers. (DP-E)

- 3594 Vargas Gonzalez, W., Villegas de Olazaval, H., Alfaro de Paniagua, L., Amat Sanchez, A.** Costa Rica, Ministerio de Salud, Direccion General de Salud, Departamento de Salud Rural. *Programa de salud para comunidades rurales. (Health programme for rural communities)*. San Jose, Ministerio de Salud, Direccion General de Salud, Departamento de Salud Rural, 1975. 88p. Span.

As part of its national plan (1974-1980), Costa Rica has devised a low-cost rural health programme comprising communicable disease control, maternal and child health, first aid, environmental health, and health education. The programme will be delivered by auxiliary health personnel and will be progressively extended to cover the entire rural population. This document details the content, organization, and administration of the programme plus its requirements in terms of manpower, facilities, and finances. Curricula for auxiliaries and community leaders and a list of supplies for a health post are included in the appendices. (HC-L)

- 3595 WHO, Alexandria.** *Annual report of the director, 1976-77.* Alexandria, WHO, 1977. Iv.(various pagings). Engl.

The annual report of the Director of WHO for the Eastern Mediterranean covers: general programme development; strengthening of health services; family health; health manpower development; prevention and control of diseases; prophylactic, diagnostic, and therapeutic substances; promotion of environmental health; health statistics; coordination; organizational matters; administration and finance; and public information. Annexes include lists of projects, agreements signed, and technical reports issued. (DP-E)

- 3596 Wilenski, P.S.** *Health organization in developing countries; innovations in the People's Republic of China.* Medical Journal of Australia (Sydney), 1(1-2), 1-8 Jan 1977, 29-31. Engl.

This article outlines the distinctive features of the development of health care in the People's Republic of China since 1949, concentrating on the mobilization of surplus labour and the development of new types of medical

personnel and institutions. Through the Patriotic Health Movement, a large portion of the surplus agricultural labour force is involved in public health activities, especially those related to sanitation. A shortened medical curriculum and emphasis on field work are some of the basic changes in professional medical training, while the widespread use of barefoot doctors indicates the effectiveness of well-trained nonprofessional medical workers. A cooperative system of financing based on the local production brigades also reflects the basic rural orientation of the Chinese health system. (FM)

- 3597 Zawde, D.** *Health care in socialist countries.* Ethiopian Medical Journal (Addis Ababa), 13(3), 1975, 97-100. Engl.

Although health services vary considerably in socialist countries, they share some common features. Health care is virtually free, easily accessible, and directed by a single, central authority acting in conjunction with regional organizations. This ensures that local needs are met. The emphasis that has been placed on prophylaxis is reinforced by social and economic measures of the state and public health bodies. Public participation is strong and continuing education occurs at all levels. Along with the development of local level medical care, the state has encouraged and supported specialized care and personnel training institutions. (FM)

II.3 Planning

See also: 3513, 3523, 3568, 3579, 3581, 3696, 3883, 3940, 4200

- 3598 Academia de Ciencias Medicas, Fisicas y Naturales de Guatemala, Guatemala.** *Programa de evaluacion del sistema de salud rural de Guatemala; plan y metodologia. (Programme for evaluating Guatemala's rural health system; plan and methodology)*. Guatemala City, Academia de Ciencias Medicas, Fisicas y Naturales de Guatemala, 31 May 1975. Iv.(various pagings). Span. Refs.

This document describes the methodology of a plan for evaluating Guatemala's rural health system, whose backbone is a series of rural health posts manned by rural health technicians. A number of pilot studies are planned on the rural health milieu, the organization of the system and the activities of the rural health technician, support systems, the health information system, and economic aspects. The design, organization, administration, and budget of the plan are examined. (RMB)

- 3599 Acuna, H.R.** *Community participation in the development of primary health services.* Bulletin of the Pan American Health Organization (Washington, D.C.), 11(2), 1977, 95-99. Engl. Ninth International Conference on Health Education, Ottawa, Canada, 29 Aug-3 Sep 1976.

Development planning must concentrate on educating individuals and groups to assume responsibility for their own development through active and thoughtful community participation. An analysis of a community's attitudes and values is therefore seen as the key to providing primary health services best suited to local needs. Community-oriented services should lead to greater motivation of groups and individuals, which would in turn guarantee maximum utilization and distribution of available resources. For its benefits to be permanent, health care must also be closely related to other sectors of socioeconomic development and intersectoral coordination of activities should be encouraged. Training of personnel should foster awareness of local needs, motivations, and expectations. The resulting changes in attitudes and behaviour would lead to the structural and institutional changes necessary for effective programmes. (FM)

- 3600 Barger, S.B.** *Primary Care Index: a tool for health service plan development and resource allocation.* Cincinnati, Ohio, Health Planning and Resource Development Association of the Central Ohio River Valley, Inc., Health Systems Development, Mar 1977. 22p. Engl. 20 refs. Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978. Unpublished document.

This article proposes a primary care planning tool, the Primary Care Index (PCI), that can assist the planning process by quantifying primary care requirements and facilitate resource development by defining priorities for future development. The PCI has been designed for use in a rural setting and places much emphasis on accessibility of services. After reviewing previous efforts to arrive at health care indices, the author demonstrates the procedure for determining the PCI. The data needed to compute the PCI are usually readily available and a separate, costly study is not required. Uses of the PCI are discussed. (DP-E)

- 3601 Bayoumi, A.** *Primary health care; an epidemiological approach.* Kuwait, Kuwait University, Faculty of Medicine, 24 May 1978. 18p. Engl. Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978. Unpublished document.

In contrast to the traditional system of clinical diagnosis and treatment of patients actively seeking help, the author presents an alternative approach to primary care. This newer model combines an epidemiological analysis to assess the health needs of a defined population group and arrive at a community diagnosis with a logical interpretation of this data that allows health planners to set priorities, design community action programmes, and evaluate the results achieved among all members of

the target group whether they sought care or not. Concepts of definition and application (functions, institutions, manpower, medical education) are described and elaborated in figures and tables. (DP-E)

- 3602 Behm Rosas, H.** *Crecimiento rapido de la poblacion y satisfaccion de las necesidades de salud en los paises de la America Latina. (Rapid population growth and the satisfaction of health needs in Latin America).* Revista Centroamericana de Ciencias de la Salud (San Jose), 3(6), Jan-Apr 1977, 111-122. Span.

The net effect of rapid population growth in Latin American countries is to increase the amount of unmet health needs; nevertheless, population growth is not the most significant obstacle to meeting health needs in these countries. Data are cited to show that the socioeconomic structure of Latin American society is responsible for both low levels of health and deficiencies in the distribution of health care services and, as such, must be considered the heart of the problem. (HC-L)

- 3603 Bekele, M.** *Primary health care in the development perspective.* n.p., 25 May 1978. 14p. Engl. Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978. Unpublished document.

Ill health in developing countries can be largely attributed to economic inequalities that are only made greater by development. Agricultural and water resources are being mismanaged; education is too exclusive, particularly ignoring women; industrial development benefits too few people; and drug programmes are inadequate. New policies and strategies are required to alleviate these problems. National resources and development should be decentralized, more planning done locally, and self-sufficiency promoted. A broad national and international development strategy, people-oriented and health-promotive, with primary health care as a driving force is needed to achieve better health for all. (DP-E)

- 3604 Bovay, G.M., ed(s).** WHO, Geneva. *Health for all by the year 2000.* Geneva, WHO, Division of Public Information, n.d. 18p. Engl.

For many rural areas in developing countries, a scarcity of natural resources, poor communications, hostile climate, and political and social difficulties have produced a vicious circle of poverty and poor health. These problems must be attacked at their roots. Health services must be designed to meet community needs, be organized at the community level, utilize community resources, adapt modern technology at a reasonable cost, and be available to all. The services should be supported by national authorities and integrated with other rural development programmes and with the existing health system. (DP-E)

- 3605 Calvo Nunez, H.** Colombia, Ministerio de Salud Publica y Asistencia Social. *Desarrollo del sistema nacional de salud; documento ISNS-1: la politica nacional de salud. (Development of the national health system; document ISNS-1: the national health policy)*. Bogota, Ministerio de Salud Publica y Asistencia Social, Mar 1975. 54p. Span.

Having decided to implement a national health system throughout the country, the government of Colombia felt it necessary to define a national health policy by which the system might operate. This document describes the health and demographic determinants of the national health policy, sets down in 14 points the policy itself, discusses the 10 basic activities through which the national health policy is to be expressed (i.e., personal health care, environmental sanitation, planning, information, research, organization and administration, etc.), and indicates the immediate steps to be taken to expedite the adoption of the national health policy at the national, regional, and local levels. (HC-L)

- 3606 Chiang, C.L.** *Making annual indexes of health.* Health Services Research (Chicago, Ill.), 11(4), Winter 1976, 442-451. Engl. 26 refs.

A discrete-state, continuous-time Markov model of health states and state transition probabilities is outlined as the basis of a health index that would reflect the annual health distribution and expected health changes of a population. The final index is additive, summing expected durations of the various health states over an entire population sample. A general procedure for collecting data during overlapping 6-week periods from numerous population subsamples is described. (Modified journal abstract.)

- 3607 Children in the Tropics, Paris.** *What is primary health care (PHC)? (General principles)*. Children in the Tropics (Paris), (108-109), 1977, 14-18. Engl.

The basic principles of primary health care (PHC) are presented. PHC programmes should be designed to meet the needs of the community with human, institutional, and financial resources provided by the community. They should be an integral part of the national health system and of the broad programme of community development. Continuing dialogue between the population and the services is essential to such a programme, which must also integrate preventive, curative, promotive, and rehabilitative care for the individual, the family, and the community. (DP-E)

- 3608 Children in the Tropics, Paris.** *Developing the awareness of the administration and of the staff of the technical services.* Children in the Tropics (Paris), (108-109), 1977, 19-22. Engl.

Points to be borne in mind in setting up and implementing a primary health care programme are discussed. It is important to collaborate with the traditional power structure, the local administration, and government departments such as agriculture and education. Suggestions on how to achieve this collaboration and a brief

case history of a malaria control campaign in a rural village are included. (DP-E)

- 3609 Christian Medical Commission, World Council of Churches, Geneva.** *Special news issue: the Annual Meeting of the Christian Medical Commission, 17-23 Apr 1977, held at Royal Holloway College, Egham, Surrey, England.* Contact (Geneva), (29), Jun 1977, 1-13. Engl.

Annual Meeting of the Christian Medical Commission, Egham, UK, 17-23 Apr 1977.

Also published in French in Contact (Geneva), (30), Jul 1977, 1-13.

To set the tone for the next 2-3 years, the following aspects of the work of the Christian Medical Commission (CMC) were considered at the annual conference: the role and responsibility of CMC commissioners, staff, and resource people in the field; ways of initiating and strengthening church/government relationships in health care; current understanding of primary health care and its implications for churches' involvement in community health programmes; and CMC involvement in specific medical/bio-ethical problems facing Christians today. This report contains the meeting's proceedings and a list of participants. (HC-L)

- 3610 Colle, R.D.** *Developing health education programs in rural areas.* Ithaca, N.Y., Cornell University, 1978. 23p. Engl. 29 refs.

Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978.

Unpublished document.

In discussing health education programmes in rural areas, the author confronts the problems of whether or not health education is taken seriously and how it can be made a more effective part of the primary health system. The need for health education is explored and the gap between intentions and actions in this area is considered. The potential of non-formal education and the role of the paraprofessional are discussed with a view to finding effective, low cost materials and techniques. Attempts to involve professionals in the education process are described. Finally, the author suggests possible contributions of the existing health care system. (DP-E)

- 3611 Colombia, Departamento Nacional de Planeacion.** *Plan Nacional de Alimentacion y Nutricion; esquema general de politicas y programas (documento de trabajo). (National Food and Nutrition Plan; general scheme of policies and programmes (working document))*. Bogota, Departamento Nacional de Planeacion, Unidad de Desarrollo Social, Division de Poblacion y Nutricion, Unidad de Estudios Agrarios y Grupos Interinstitucionales de Trabajo, 16 Dec 1974. 1v.(various pagings). Span.

See also entries 3612, 3614, and 3738.

This working document of the national food and nutrition plan proposes a series of special programmes for the public and private sectors in the areas of food production, consumption, and utilization that would result in the greatest possible benefit for the undernourished lower classes of Colombia. The formation of the nutritional policy upon which these programmes are based is discussed and an evaluation system set forth. Colombia's international aid policy is examined and a scheme for the plan's administration, planning, coordination, and implementation is presented. An appendix contains a list of projects. (RMB)

- 3612 Colombia, Departamento Nacional de Planeacion.** *Bases organizacionales para el adelanto del Plan Nacional de Nutricion. (Organizational basis for the implementation of the National Nutrition Plan).* Bogota, Departamento Nacional de Planeacion, Division de Poblacion y Nutricion, 19 Sep 1974. 1v.(various pagings). Span.

See also entries 3611, 3614, and 3738.

In 1974, Colombia initiated a national nutrition plan aimed at reducing the incidence of protein-calorie malnutrition in low income and at-risk groups, particularly mothers and children. This working document outlines the roles and contributions of various national and international institutions to the implementation of different facets of this plan. Special working groups will be set up to deal with the development of a general strategy for the national nutrition plan and with the establishment of projects concerning food processing and technology, nutrition education, research and manpower training, fisheries, etc. Personnel requirements for each project are listed. (RMB)

- 3613 Colombia, Departamento Nacional de Planeacion.** *Programa de Cuantificacion y Analisis del Sector Salud; presentacion conjunta de labores. (Programme for Quantification and Analysis of the Health Sector; joint working paper).* Bogota, Departamento Nacional de Planeacion, 15 Apr 1974. 128p. Span.

Colombia's department of planning, within its project for analyzing the health sector, has developed a model of linear programming that will not only generate sufficient information for planning but will also permit the quantification of resources, optimal allocation of resources, assessment of the impact of alternative strategies and programmes, and identification of barriers to tasks set by the sector. This document describes the various elements and activities that are included in the model and explains their classification. (HC-L)

- 3614 Colombia, Departamento Nacional de Planeacion.** *Esbozo general del plan nacional de nutricion (propuesta preliminar). (General outline of the national nutrition plan (preliminary proposal)).* Bogota, Departamento Nacional de Planeacion, Unidad de Recursos Humanos, Feb 1974. 26p. Span.

See also entries 3611, 3612, and 3738.

This proposal examines the background, objectives, sphere of action, resources, methods, and strategy of Colombia's national nutrition plan. Any national nutrition plan must be broad in scope but specific in objectives and this one aims to eliminate juvenile protein-calorie malnutrition in less than 5 years. A number of projects already underway that support the goal of the plan are considered. (RMB)

- 3615 Colombia, Ministerio de Salud Publica y Asistencia Social, Instituto Nacional para Programas Especiales de Salud.** *Participacion comunitaria en el plan nacional de agua potable y alcantarillado rural del Peru. (Community participation in Peru's national plan for potable water and rural sewage systems).* Bogota, Ministerio de Salud Publica y Asistencia Social, Instituto Nacional para Programas Especiales de Salud, Division de Saneamiento Basico Rural, Seccion de Promocion, S.B.R.P. No.0011, Mar 1973. 12p. Span.

The methodology of Peru's national water supply and waste disposal plan is described. The methodology includes sections on promoting the plan and choosing suitable sites, organizing the inhabitants of the selected communities and ensuring their cooperation, and constructing and administering the services. Participating communities are expected to provide approximately half of the labour and local materials are used whenever possible. By December 31, 1970, 357 communities had joined the programme. (RMB)

- 3616 Colombia, Ministerio de Salud Publica y Asistencia Social, Instituto Nacional para Programas Especiales de Salud.** *Participacion comunitaria en el plan nacional de agua potable rural de la Argentina. (Community participation in Argentina's national plan for rural potable water supplies).* Bogota, Ministerio de Salud Publica y Asistencia Social, Instituto Nacional para Programas Especiales de Salud, Division de Saneamiento Basico Rural, Seccion de Promocion, S.B.R.P. No.0014, Mar 1973. 11p. Span.

Participating communities are expected to: defray 20% of the cost of Argentina's rural water supply programme by contributing labour, materials, and money; repay 50% within 20 years; and administer and maintain the system once it has been constructed. This document presents promotional techniques for use in these communities and discusses community organizations, such as cooperatives, whose aid might be enlisted. Guidelines for operating, maintaining, and administering the water supply system are set forth. (RMB)

- 3617 Colombia, Ministerio de Salud Publica y Asistencia Social, Oficina de Planeacion.** *Estrategia y mecanismos para la ejecucion de politicas de salud; primera parte: marco conceptual, diagnostico, y politicas. (Strategy and mechanisms for putting health policies into practice; first part:*

conception, diagnosis, and policy). Bogota, Ministerio de Salud Publica y Asistencia Social, Oficina de Planeacion, Documento DNP-878-URH-UINF, 26 May 1972. 241p. Span.

After a discussion of the role of health in development, the factors that influence health policy (the environment, susceptibility of the population, public opinion, health technology, etc.) are examined. The history of health services in Colombia is traced and their structure and financing are outlined. A 2nd chapter reviews the health situation, including demographic factors, health indicators, supply and demand for services, and resources. The formation and planning of policies and strategies are covered in chapter 3 and means of executing them in chapter 4. (RMB)

3618 Conference of Missionary Societies of Great Britain and Ireland, Medical Committee, London. Model health centre. London, R.K. Hudson, 1975. 1v. (various pagings). Engl.

This report constitutes both a design primer and a reference tool for planners of health facilities in developing countries; it describes, in detailed operational and physical terms, a model health centre with a capability of serving up to 20 000 people within a radius of 10-20 miles. The report's 3 chapters briefly discuss the health and economic conditions that justify this particular approach, indicate some important areas for future study, describe the model itself, and explain the use of the appendices. The 52 appendices deal with: the functions of the various parts of the health centre and their relationships to each other; detailed diagrams for the construction of the centre; equipment lists; a room list with notes regarding expansion options; useful information regarding the duties of the doctors *vis-a-vis* the health centre; health education and some teaching aids; home and school visiting; record-keeping, statistics, and health centre evaluation; latrines and sewage disposal; water supply, purification, and storage; power; a simple operating theatre; orientation of buildings, their construction, and environmental considerations; costs and materials; reference reading in relation to a model health centre; examples of diagnostic and treatment routines serialized for use in health centres; etc. In addition, it is explained how, with careful forethought in the siting of the building and the allocation of the land, a simple clinic can be converted to a health centre and a health centre developed into a district hospital. The report is written in simple, non-technical language and accompanied by line drawings. (HC-L)

3619 Da S. Gandra, D. Concepto de comunidad y su relacion con los programas de salud. (*Concept of community and its relation to health programmes*). Educacion Medica y Salud (Washington, D.C.), 11(3), 1977, 205-236. Span. 32 refs.

The author analyzes the concepts of community, community work, and community participation and applies his findings to health programmes. He explains the approach used in community medicine, which is an attempt to move beyond the biological restrictions of medicine into the social, economic, and psychological

spheres and is more concerned with causes than with consequences (symptoms). He also points out some of the problems facing community medicine: as a community project, it has inherited past mistakes; as part of the health field, it must deal with the traditional one-sided approach to problem solving as well as the organization of the health care system and manpower training programmes. Some recommendations are included. (Modified journal abstract.)

3620 Diaz Guzman, J., Grossman, E. Asociacion Venezolana de Facultades (Escuelas) de Medicina, Caracas. Federacion Panamericana de Asociaciones de Facultades de Medicina, Bogota. Estado actual de la practica medica y del control de calidad y eficiencia de la atencion medica. (*Current state of medical practice and of quality control and efficiency of medical care*). Caracas, Asociacion Venezolana de Facultades (Escuelas) de Medicina, 1974. 17p. Span.

Quinta Conferencia Panamericana de Educacion Medica, "Educacion Medica de Hoy y Atencion Medica del Manana," Caraballeda, Venezuela, 4-7 Nov 1974.

Unpublished document; see also entries 3879 and 3625.

Control of the quality and efficiency of medical care in Venezuela has, to date, been rather poor. This paper identifies and discusses a number of mechanisms for correcting this deficiency: a built-in process of planning, implementation, and evaluation that would allow continuous comparison between desired and actual accomplishments; periodic supervision of the health worker with a view to instructing rather than censuring him; peer audit of professional medical practice through review of questionable case histories; and evaluation of the quality of medical care by means of statistical indices. Some of the terminology and concepts involved in the process of evaluation are briefly reviewed and a supervision schedule for a rural health facility is appended. (HC-L)

3621 Dubbers, E., Nejaim, J.E. Federacion Panamericana de Asociaciones de Facultades de Medicina, Bogota. Universidad del Valle, Division de Salud, Cali, Colombia. Programa de asistencia integrada a mulher e a crianca; primeiro desenho. (*Integrated maternal child health programme; preliminary design*). Cali, Colombia, Universidad del Valle, Oct 1974. 137p. Portuguese. 10 refs.

Taller Internacional sobre el Desarrollo de Modelos Simplificados de Atencion Materno-Infantil, Cali, Colombia, 25 Nov-1 Dec 1974.

The preliminary design of an integrated maternal child health programme to be implemented in the 3rd administrative region of the Brazilian state of Guanabara is presented. The health situation in this area of Brazil is examined and the programme's objectives, methodology, organization, administration, and budget are discussed. Proposed goals in both maternal and child health are set forth and the authors outline the agenda for the 1st year and consider the programme's material

and human resources. Maps and statistical data are included. (RMB)

- 3622 Echeverri, O., Saravia, J.A.** Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema de servicios de salud rural como un componente basico de los proyectos de desarrollo rural en Colombia. (Rural health services system as a basic component of rural development projects in Colombia).* Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Division de Salud, Mar 1974. 86p. Span.

A development project involving the design, implementation, and evaluation of a health care delivery system is to be carried out in an experimental area in north Cauca (Colombia). It aims to make primary health care available to at least 80% of the population within 5 years. The system will then be evaluated on the basis of its effectiveness, cost-effectiveness, and cost-efficiency and, with the necessary modifications, replicated in other parts of the country. This document describes the experimental area, project objectives and methodology, and the responsibility of the various agencies involved in its funding and implementation. (HC-L)

- 3623 Ecuador, Ministerio de Salud Publica.** *Actualizacion del plan decenal de salud para las Americas. (Implementation of the ten-year health plan for the Americas).* Quito, Ministerio de Salud Publica, Division Nacional de Planificacion, Nov 1976. 15p. Span.

This document sets forward goals that Ecuador hopes to achieve by 1980: the control of 20 communicable diseases; reduction in infant, preschool, and maternal mortality; 60% maternal and child health services coverage; improvements in nutrition; and better provision of water supply and sewage disposal services. It also describes, in general terms, the country's aims relevant to chronic diseases and cancer, mental health, dental health, accident control, nursing services, the planning and development of the health infrastructure, the collection of health and vital statistics, and the development of health personnel and resources. (HC-L)

- 3624 Evans, G.P.** *Use of cost-benefit and cost-effectiveness analysis in the planning of health manpower.* Washington, D.C., Pan American Health Organization, 1973. 22p. Engl.

Pan American Conference on Health Manpower Planning, Ottawa, Canada, 10-14 Sep 1973. This document describes a method by which cost-benefit analysis and cost-effectiveness analysis can be used to determine health manpower priorities. Briefly, the method involves: establishing priority service areas according to the incidence, severity, and vulnerability of the disease in question; determining the level of health services that will prevent the maximum number of deaths and provide treatment for the largest number of cases, according to their severity; and finding the most

economical combination and utilization of health personnel for delivering these services. A number of approaches to achieving the last item (comparative studies, pilot projects, functional analysis, etc.) are discussed. (HC-L)

- 3625 Fayad Camel, J.** Federacion Panamericana de Asociaciones de Facultades de Medicina, Bogota. Asociacion Venezolana de Facultades (Escuelas) de Medicina, Caracas. *Informacion y toma de decisiones en los servicios de salud. (Information and decision-making in the health services).* Caracas, Asociacion Venezolana de Facultades (Escuelas) de Medicina, 1974. Span.

Quinta Conferencia Panamericana de Educacion Medica, "Educacion Medica de Hoy y Atencion Medica del Manana," Caraballeda, Venezuela, 4-7 Nov 1974.

Unpublished document; see also entries 3620 and 3879.

On the premise that intelligent decision-making is based on the possession of adequate information, this paper identifies and discusses six categories of essential information. They are: indicators of present health status (e.g., mortality rate, infant mortality rate, mortality by cause, morbidity by cause, life expectancy at birth, etc.), data on the causes of morbidity and mortality, demographic and socioeconomic data, data on environmental conditions, and data on health resources, their efficiency, and their utilization. It is stressed that a small amount of data properly analyzed is preferable to a large amount of poorly analyzed data. (HC-L)

- 3626 Florez O., E.** Federacion Panamericana de Asociaciones de Facultades de Medicina, Bogota. Universidad del Valle, Division de Salud, Cali, Colombia. *Proyecto para la prestacion de servicios de salud basado en un sistema de regionalizacion. (Health services delivery project based on a regionalized system).* Cali, Colombia, Universidad del Valle, Division de Salud, 1974. 128p. Span.

Taller Internacional sobre el Desarrollo de Modelos Simplificados de Atencion Materno-infantil, Cali, Colombia, 25 Nov-1 Dec 1974.

Unpublished document.

Epidemiology and demographic data from Colombia were used to construct this model of a health care system concentrating on family, maternal, and child health. The system is based on hospital, health centre, health post, and domiciliary services; the health manpower utilized and the care provided at each level are discussed and outlined in graphs and flowcharts. Separate sections cover medical records, operational methodology, evaluation, organization and administration, and cost analysis. Statistical data are included. (RMB)

- 3627 Gish, O.** *Guidelines for health planners; the planning and management of health services in developing countries.* London, Tri-Med Books, 1977. 90p. Engl. 19 refs.

The aim of this monograph is to alert health decision-makers in Third World ministries and external donor agencies to the basic factors that must be taken into account when planning the allocation of health sector resources under conditions of limited budgets, reduced numbers of health workers, and relatively low levels of administrative capability. These aspects of health planning are discussed: the planning machinery, both within and without the ministry of health; making a health plan — gathering data, setting objectives, and controlling expenditures; incorporating preventive services into the plan; health manpower training and deployment; the use and distribution of curative services; pharmaceuticals and other ancillary services; village and mobile services; non-governmental (voluntary, private, insurance-based, etc.) services; and external aid. Although sufficient data exist in almost all Third World countries to put these aspects of health services development into practice, a number of areas that could profit from further research are indicated, such as registration of vital statistics, hospital outreach, utilization of mobile teams, and drug purchasing, distribution, prescribing, and utilization. A glossary of terms and an index are included. (HC-L)

3628 Gordon, L.J. *Unified planning efforts needed in a public health agency.* Journal of Environmental Health (Denver, Col.), 40(2), 1977, 99-100. Engl. Planning is essential to understanding agency problems, objectives, programme development, and programme evaluation. The problems to be solved and the resources available must be examined before objectives can be set. An objective must be measurable and have a stated time limit. Evaluation techniques must be included. Because planning is too often viewed as an end in itself, goal-oriented planning should be done by all personnel, not an elite, and its aim should be a high level of health for the public rather than larger bureaucracies. (DP-E)

3629 Green, L.W. *Evaluation and measurement; some dilemmas for health education.* American Journal of Public Health (New York), 67(2), Feb 1977, 155-161. Engl. 31 refs.

The nature of health education poses dilemmas of evaluation and measurement because the peculiar characteristics of health education make it resistant to some of the standard applications of research procedures. There are also problems in measuring outcomes of health education and questions to which administrators and practitioners must address themselves in the absence of an adequate data base. Health education needs support based on evaluation to determine the threshold level, the point of diminishing returns, and the saturation level for various programmes. (DP-E)

3630 Grosse, R.N. *Propuesta sobre las actividades que deben ser efectuadas en la planificacion del sector salud en la Republica de Guatemala. (Proposal concerning the planning activities that should be carried out in the health sector of the Republic of Guatemala).* Guatemala City, Secretaria del Consejo de Planificacion Economica, Sep

1973. 15p. Span.

Unpublished document.

The author evaluates the health status of the inhabitants of Guatemala's mountainous regions, farms and ranches, and urban areas. The organization of the health ministry and the hospital system, which absorbs most of the country's health budget, is discussed. The author suggests that reforms in the existing system could be drawn up and implemented by working groups (which were not yet created) on these topics: development of a national health strategy, decentralization and regionalization of health services, cost analysis, provision of services in each of Guatemala's geographical areas, etc. (RMB)

3631 Guatemala, Ministerio de Salud Publica y Asistencia Social. *Ensayo sobre un modelo de simulacion ecologica para la elaboracion del plan nacional de salud. (Essay on an ecological simulation model for the elaboration of the national health plan).* Guatemala City, Ministerio de Salud Publica y Asistencia Social, Unidad de Planificacion y Estadistica, Oficina de Asesoria en Planificacion de Salud, Referencia APS/73/2, 1973. 20p. Span.

Unpublished document.

This model was developed from the experiences of Guatemala's national rural health programme. It contains submodels of demography, epidemiology, financing, health sector organization and resources, human resources, and political instruments, such as laws and health regulations, that can be used to reinforce the programme. The model's planning and methodology are described. The model is meant to help health planners predict the effects of changes in the existing health care system before those changes are actually implemented. (RMB)

3632 Gutierrez, R. *Organizacion Panamericana de la Salud, Washington, D.C. Participacion de la universidad en la planificacion de la salud. (University participation in health planning).* Washington, D.C., Organizacion Panamericana de la Salud, 1973. 8p. Span.

Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973.

Bound with entries 3518, 3521, 3541, and 4083 in entry 3534.

This document traces the establishment of planning offices in Latin America during the 1960s and reviews the planning role of various national institutions with emphasis on the Ministry of Health, the Institute of Social Security, and the university and the conflict of interest among them. The factors that prevent the university from carrying out its proper planning functions are pointed out; these include the lack of a national health plan, the scarcity of trained planning personnel in medical school faculties, the ill-defined objectives of medical training, the conflict between preventive and curative services, etc. (RMB)

- 3633 Heimann, S.R., Lusk, E.J.** *Health facility planning: an example of a decision flexibility approach.* Operational Research Quarterly (Elmsford, N.Y.), 27(2), 1976, 449-457. Engl. 8 refs.

A planning model based on flexibility in the face of uncertain future conditions is applied to the improvement of a nursing home's facilities. The home wished to increase its bed facilities from 34:1 000 people aged more than 65 years to 54:1 000 based on projected needs. Site selection for future construction was based on such factors as round trip distance between locations, locational demand for beds, and locational availability probability for construction in each of three time periods. The decision to build in a given area at a given time could be made according to these criteria with alternatives ranked according to the most advantageous combination of these factors. (FM)

- 3634 Hendrickse, R.G.** *Paediatrics.* Proceedings of the Royal Society of London (London), 199(1134), 19 Oct 1977, 73-82. Engl.
Royal Society Discussion of Technologies for Rural Health, London, UK, 9-10 Dec 1976.

The most pressing needs of rural children in developing countries are better nutrition, improved sanitation, protection from disease, and easier access to medical facilities. Unfortunately, a nation's ability to meet these needs is largely determined by its politics and most governments tend to favour a hospital-based, curative type of medical care. Taking into account this curative bias, the author examines the functions of rural hospitals and discusses the essential services they should provide (radiography, laboratory and surgery facilities, blood bank, etc.), manpower requirements, extended functions (immunization programmes, malaria control, etc.), special problems in child health, and pharmaceutical supplies. Nevertheless, he stresses the need for preventive medicine and the redistribution of available resources in preference to the continued elaboration of hospital-based systems. (DP-E)

- 3635 India, Department of Family Welfare.** *New approach to health and family welfare.* New Delhi, Department of Family Welfare, Mass Mailing Unit, n.d. 1v.(unpaged). Engl.

The Prime Minister of India proposes a new approach, based on education, to health and family welfare. While it is necessary to care for the sick, it would be more useful to stress preventive measures with the result that far fewer people would fall ill. Teachers should learn about such matters as nutrition and pass this knowledge on to their students. Staff in community health centres also need better training. These measures, coupled with a renewed cultural pride, will lead to better health for all. (DP-E)

- 3636 Johnson, R.L.** *Need for health education; priorities and strategies.* Preventive Medicine (New York), 6(3), Sep 1977, 466-468. Engl.

To make the best use of the resources available for health education, the establishment of priorities and careful, long-term planning are essential. Cooperation between public and private organizations should take into account time-frame limits, costs, effectiveness, numbers to be affected, and national strategies. Patient education is used as an example of one priority target. The need to determine the illnesses most susceptible to patient education, to evaluate the teaching methods and materials already available, and to decide where, how, and by whom the teaching is best done and how it is to be financed are examples of the questions to be answered in planning priorities. (FM)

- 3637 Johnston, B.F., Meyer, A.J.** *Nutrition, health, and population in strategies for rural development.* Economic Development and Cultural Change (Chicago, Ill.), 26(1), Oct 1977, 1-23. Engl. 48 refs.

A rural development strategy combining a broadly-based agricultural effort aimed at increasing the level and stability of food crop yields with the delivery of health and family planning services is advocated as the best means of achieving self-sustaining economic growth, reducing poverty, improving nutrition and health, and slowing the rate of population growth in the developing countries. This paper examines the origin of current concern over poverty in the developing world, the inter-relationship between socioeconomic development and fertility, the problem of determining priorities in rural development and the justification of the above-mentioned approach, and the advantages and problems involved in designing and implementing an integrated health and family planning delivery system. (HC-L)

- 3638 Johnston, M.** *Planification et dialogue dans la commune.* (Planning and dialogue in the community). Contact (Geneva), (34), Mar 1978, 1-14. Fren.

Based on the experiences of the *Dana Sehat* programme in Java, Indonesia, various aspects of planning, implementing, and evaluating a community health and sanitation programme are outlined. Practical advice is given on obtaining government support, forming and training a community health team, motivating the community, encouraging local participation, establishing priorities, and setting up a pilot project. The methodology of surveys to canvas public opinion and support for the projects is discussed. Particular attention is paid to the importance of on-going and global evaluations. (FM)

- 3639 Kaplan, R.M., Bush, J.W., Berry, C.C.** *Health status; types of validity and the Index of Well Being.* Health Services Research (Chicago, Ill.), 11(4), Winter 1976, 478-507. Engl. 45 refs.

The concept of validity as it applies to measures of health and health status is examined in the context of a set of standard, widely accepted definitions of validity. The Index of Well Being has been constructed to fulfil the definition of content validity by including all levels of function and symptom/problem complexes, a clearly defined relation to mortality, and consumer ratings of

the relative desirability of the function levels. This index and the Weighted Life Expectancy, a simple method of estimating a comprehensive population index of health status, are described. (Modified journal abstract.)

- 3640 Levin, L.S., Katz, A.H., Holst, E.** *Self-care: lay initiatives in health.* New York, PRODIST, 1976. 133p. Engl.

International Symposium on the Role of the Individual in Primary Health Care, Copenhagen, Denmark, 11-15 Aug 1975.

In 1975, 29 scholars from Europe, Israel, and the USA met in Copenhagen to explore the concept of the lay contribution to primary health care. They discussed: the nature and extent of self-care; the origins of the new impetus toward self-care; philosophical, ethical, political, economic, administrative, and legal issues raised by the movement toward self-care; research challenges in self-care; and the place of international cooperation in research into self-care. The last part of the book contains an annotated bibliography of (mostly American) material relevant to self-care. (HC-L)

- 3641 Loring, W.C.** *Environmental health education: a different orientation.* In *Health Education: Addresses Presented at the IX International Conference on Health Education*, Washington, D.C., Pan American Health Organization, Scientific Publication No.360, 1978, 51-59. Engl. 29 refs. Ninth International Conference on Health Education, Ottawa, Canada, 29 Aug-3 Sep 1976. Also published in French and German; also published in English in *International Union of Health Education* (Geneva), 20(1), 1977, 51-56; see also entry 3648.

Environmental health education differs from personal hygiene education in that it aims to change community and corporate, as well as individual, behaviour. As such, it demands an altruistic response from community members that must be sustained long after the original impetus for it is exhausted. This paper points out the main challenges involved in environmental health education and presents a schema showing the environmental factors, their health-related responses, and alternative points for health and safety intervention in human settlements. A selected bibliography has been included as a complement to the schema. (HC-L)

- 3642 Mahathevan, R.** *Occupational health in West Malaysia.* *Medical Journal of Malaysia* (Singapore), 30(4), Jun 1976, 273-278. Engl.

This paper briefly summarizes and critically examines occupational health and safety legislation enacted in West Malaysia from 1933 to the present. It is noted that obstacles to developing and implementing an occupational health programme are threefold: the lack of comprehensive legislation and authority to regulate and enforce it, a dearth of personnel trained in occupational health, and apathy among workers, and possibly trade unionists, toward health in general. A number of recommendations for improving the situation are put forward. (HC-L)

- 3643 Mahler, H.** *Promotion of primary health care in member countries of WHO.* *Public Health Reports* (Rockville, Md.), 93(2), Mar-Apr 1978, 107-113. Engl.

An international approach to health based upon active involvement of the people has been advocated at inter-governmental conferences since 1937; again in 1975, WHO announced its intention to promote the development of primary health care in all member countries through numerous activities at the national, regional, and international levels. This paper examines some of these activities plus the reasons why countries that were slow to adopt the principles of primary health care in the past may now be ready to do so. It is suggested that, if countries can find the political courage to reorient their health priorities now, an acceptable level of global health could be a reality by the year 2000. (HC-L)

- 3644 McQueen, R.J.** *Health screening programs.* *Hospital Administration in Canada* (Don Mills, Ont.), 18(6), Jun 1976, 66-68. Engl.

Three categories of diseases lend themselves to screening: 1) diseases of the general population that can benefit from early treatment; 2) occupational diseases, which vary according to type of employment; and 3) diseases that make the carrier dangerous to others. To be effective, screening programmes should include specific tests for individuals as well as methods for choosing the individuals to be included in each group. If a programme of specific tests relating to identified diseases is offered, it will one day be possible to show a positive cost benefit from screening programmes. (RMB)

- 3645 Meyer, E.E., and Sainsbury, P., ed(s).** WHO, Geneva. *Promoting health in the human environment.* Geneva, WHO, 1975. 69p. Engl.

The technical discussions held during the 27th World Health Assembly (1974) are reviewed with an eye to the development of a more humanistic approach to health care that considers the health status of an individual within the context of his human environment. The concept of human environment is analyzed in terms of personal life stresses, socioeconomic stresses, population pressures, social change, geographical and social mobility, urbanization, family patterns, alienation of the elderly, social institutions, and sociocultural differences. The role of local health services is examined in terms of health service philosophies, the health team, citizen participation, and integration of health, welfare, and social services. Conclusions and recommendations concerning the future role of the health services, research and methodologies, and international action are set forth. (RMB)

- 3646 Morley, D.** *Organization of paediatric care.* *Proceedings of the Royal Society of London* (London), 199(1134), 19 Oct 1977, 161-168. Engl. 8 refs.

Royal Society Discussion of Technologies for Rural Health, London, UK, 9-10 Dec 1976.

Within the community, certain priorities in child health care should be recognized and encouraged. Nutrition, which can be monitored by the use of simple mass

charts, must be improved and diarrhea and respiratory infections controlled. Vaccines must be delivered in more effective form. Parents must be taught to practice family planning to ensure a longer interval between births and provide a better environment for existing children. To bring about necessary changes in practices and attitudes, some of the resources available to the urban centres must be appropriated for use in rural areas and there must be a greater emphasis on the use of part-time health workers. (DP-E)

- 3647 Narain, R.** India, Department of Family Welfare. *Towards a new health policy*. New Delhi, Department of Family Welfare, Mass Mailing Unit, n.d. 1v.(unpaged). Engl.

The Minister of Health of India announces that new programmes in health care, family planning, and family welfare are being planned. The emphasis will be on rural health problems with each village selecting a community health worker and a midwife to be trained by the state and work part-time in the village. While encouraging the small family norm, the state will oppose compulsory sterilization and limitation of family size. Matters of family welfare such as nutrition, clothing, shelter, drinking water, education, and employment will also receive greater attention. An attempt will be made to enlist the aid of all influential voices in the community in these endeavours. (DP-E)

- 3648 Pan American Health Organization, Washington, D.C.** *Health education; addresses presented at the IX International Conference on Health Education*. Washington, D.C., Pan American Health Organization, Scientific Publication No.360, 1978. 59p. Engl. Refs.

Ninth International Conference on Health Education, Ottawa, Canada, 29 Aug-3 Sep 1976.

Representatives of over 80 countries met to discuss: health policy, social goals, and the dynamics of development as bases for health education; trends in the organization of health care and their implications for health education; the impact of health education on environmental risks and life-style modification; and emerging challenges in health education. This monograph contains the keynote addresses presented during the plenary sessions of the conference and represents, in part, the conference proceedings. (HC-L)

- 3649 Parker, A.** *Primary care; definition and purpose*. In Covey, L., Saltman, S.E., Epstein, M.F., eds., *Medicine in a Changing Society*, 2 edition, St. Louis, Mo., C.V. Mosby, 1977, 83-106. Engl.

In a changing world, "primary health care" needs a definition, something it has never had. Certain questions must be asked about primary health care and its aims. For example, what should be its scope? Should it include health orientation as well as disease orientation? Should the unit of attention be the individual or the family? Should it involve other professionals, e.g., dentists, optometrists, mental health workers? Only by examining such issues can we develop a health care system

that accessible to the individual and responsive to his needs. (DP-E)

- 3650 Parker, A.W., Walsh, J.M., Coon, M.** *Normative approach to the definition of primary health care*. Millbank Memorial Fund Quarterly (New York), Fall 1976, 415-438. Engl.

In an attempt to arrive at a definition of primary health care, 92 abstract statements on the subject were submitted to panels of "experts," consumers, public health nurses, and social workers for ranking. The experts set a high priority on improving the delivery of medical care and consumers stressed the need to improve access, while the public health workers were concerned with enhancing the quality of patient-provider relationships. All groups emphasized preventive measures and stressed a dignified, personalized, and caring manner of delivery. No group gave priority to the broadening of primary care from medical care to a more inclusive health care. (DP-E)

- 3651 Perkin, G.W., Duncan, G.W., Mahoney, R.T., Smith, R.H.** *Contraceptive development for developing countries; unmet needs*. Proceedings of the Royal Society of London (London), Series B, 195(1118), 187-198. Engl.

The authors discuss recent developments in contraception and identify four areas where additional efforts would help meet the needs of developing countries. A product development laboratory responsible for dosage form, stability testing, quality control, product and packaging modification, and production of research supplies would increase the acceptability of existing methods and accelerate new developments. Also, a contraceptive information service would provide full disclosure information to family planning programmes and a patent and licensing administration would ensure that contraceptives developed with public funds are available at a reasonable cost. Finally, a contraceptive introduction planning unit would help developing countries incorporate new methods into their family planning programmes. (Modified journal abstract.)

- 3652 Perkins, F.T.** *Technology for prophylactic immunization*. Proceedings of the Royal Society of London (London), 199(1134), 19 Oct 1977, 99-107. Engl.

Royal Society Discussion of Technologies for Rural Health, London, UK, 9-10 Dec 1976.

Successful immunization requires that vaccines be safe and effective at the time of use. This means that the quality of the vaccine must be guarded from the time it is produced until it is administered. The author discusses proper storage, particularly refrigerators, and transport facilities and presents a simplified immunization schedule suitable for use in developing countries. Vaccines with higher stability are recommended. The author also suggests that laboratories be set up to carry out random quality checks on the vaccines at various points in the delivery system. (DP-E)

- 3653 Ramirez Duque, H., Gartner A., H., Lasprilla J., J., Uribe N., L.** Colombia, Ministerio de Salud Publica y Asistencia Social. *Rediseño del sistema nacional de salud, anexo no.4 al documento RSSC-10, indicadores propuestos para decisiones de políticas y evaluación del proceso de planificación. (Redesign of the national health system, annex no.4 to document RSSC-10, proposed indicators for policy-making and evaluation of the planning process)*. Bogota, Ministerio de Salud Publica y Asistencia Social, Documento RSSC-14, 2 Dec 1973. 14p. Span.
See also entries 3515, 3581, 3654, 3655, 3657, and 3658.

As part of the redesign of the Colombian health system, 34 indicators that adequately quantify and characterize health status and the progress achieved by health programmes have been devised for application at the regional level. The indicators include mortality, birthrate, index of medical coverage, index of dental coverage, index of sanitation, life expectancy at birth, adequacy percentage of calorie intake, etc. This document describes the use and calculation of each. (HC-L)

- 3654 Ramirez Duque, H., Gartner A., H., Lasprilla J., J.** Colombia, Ministerio de Salud Publica y Asistencia Social. *Rediseño del sistema nacional de salud, anexo no.1 al documento RSSC-10; datos estadísticos necesarios para la planificación, programación y normalización. (Redesign of the national health system, annex no.1 to document RSSC-10; statistical data necessary for planning, programming, and standardization)*. Bogota, Ministerio de Salud Publica y Asistencia Social, Documento RSSC-11, 2 Dec 1973. 22p. Span.
See also entries 3515, 3581, 3653, 3655, 3657, and 3658.

Appropriate planning, programming, and standardization within the new Colombian health service are dependent upon the timely availability of sufficient, reliable statistics. This document describes, in tabular form, the type of information, source of information, pertinent documents, level of data collection, and manner of data collection required *vis-a-vis* the following subsectors or aspects of the health system: medical consultation, hospitalization, dentistry, nursing, vaccination, availability and utilization of resources, output, coverage, and environmental health. (HC-L)

- 3655 Ramirez Duque, H., Gartner A., H., Lasprilla J., J.** Colombia, Ministerio de Salud Publica y Asistencia Social. *Rediseño del sistema nacional de salud, anexo no.3 al documento RSSC-10; formularios e instructivos para la programación. (Redesign of the national health system, annex no.3 to document RSSC-10; formulae and instructions for programming)*. Bogota, Ministerio de Salud Publica y Asistencia Social, Documento RSSC-13, 2 Dec 1973. 52p. Span.
See also entries 3515, 3581, 3653, 3654, 3657, and 3658.

Under the redesigned model of the Colombian health system, a number of formulae have been developed to enable health planners and administrators to make the best possible use of statistical data. This document presents, in logical sequence, formulae for: calculating medical, hospital, nursing, vaccination, dental, and environmental needs (in terms of instruments and costs) on a local and regional basis; determining the resources that are available for the fulfillment of these needs on a local and regional basis; determining the investment required at the local level; and estimating the numbers of additional health personnel required, on a sectional basis. Each formula is accompanied by a set of instructions regarding its use. (HC-L)

- 3656 Ramirez Duque, H., Rizo Gil, A.** Colombia, Ministerio de Salud Publica y Asistencia Social. *Rediseño del sistema nacional de salud. (Redesign of the national health system)*. Bogota, Ministerio de Salud Publica y Asistencia Social, Documento RSSC-6, 26 Oct 1973. 33p. Span.
See also entry 1484 (volume 3).

The gap between health needs and health services has prompted the Colombian government to redesign the national health system to better accommodate the aims and strategies of the national health plan. To this end, 14 groups have been charged with examining and making proposals regarding these aspects of the current health services: coordination, cost-benefit of certain projects, data collection, maternal and child health, legal matters, financial matters, policy centralization and administrative decentralization, research, planning, community participation, health manpower, "critical" imports (e.g., drugs, medical equipment, etc.), standards, and medical care. This report describes the groups' progress to date and lists previously published documents relating to the new design. (HC-L)

- 3657 Ramirez, H., Rizo, A.** Colombia, Ministry of Public Health and Social Welfare. *Redesign of the national health system; description of the redesign of the national health system (synopsis)*. Bogota, Ministry of Public Health and Social Welfare, Documento RSSC-6, 26 Oct 1973. 30p. Engl.
See also entries 3515, 3581, 3653, 3654, 3655, and 3658.

The redesign of the Colombian health system was precipitated by the need for a more effective mechanism of policy implementation in the light of the government's decision to make the health sector a cornerstone of the national development plan. As background to the redesign, this document briefly summarizes the present Colombian health situation, sets forward in 10 points health sector policies and strategies, and quantitatively describes in seven tables progress toward the fulfillment of health sector aims. It then gives a brief synopsis of the hypotheses, activities, and progress of the research project on the redesign of the health system. A list of documents prepared by the project are included. (HC-L)

- 3658 Ramirez, H., Gartner, H., Rizo, A., Lasprilla J., J., Gomez, L.C., Botero C., H., Sarue, E.** Colombia, Ministry of Public Health and Social Welfare. *Redesign of the national health system; preliminary proposal for an organizational and functional profile of the health system.* Bogota, Ministry of Public Health and Social Welfare, Document RSSC-4, 17 Apr 1973. 39p. Engl. See also entries 3515, 3581, 3653, 3654, 3655, and 3657.

Any organizational and functional profile of a health system should permit the identification and definition of the elements of the system, description of the relationships that should exist among those elements for optimal functioning of the system, allocation of services to potential users of the system in accordance with government policy, and design of an administrative structure that will most efficiently serve the functional needs of the system. Each of these items is discussed in this preliminary proposal for an organizational and functional profile of the Colombian health care system. (HC)

- 3659 Reinke, W.A., Parker, R.L., Alexander, C.A., Taylor, C.E.** John Hopkins University, School of Hygiene and Public Health, Department of International Health, Baltimore, Md. *Functional analysis of health needs and services.* New York, Asia Publishing House, 1976. 292p. Engl 40 refs.

This monograph reports on the development of a methodology for assessing health needs and resources in a manner that is comprehensive, systematic, and realistically complete, yet sufficiently simple for routine application. It differs from other planning methodologies in that it is not bound by stereotypes of professional categories; instead, health actions are expressed in terms of functions to be filled, without unwarranted presumptions as to who should fill them. The monograph is divided into 4 parts: the 1st constitutes an introduction to the functional analysis approach and its rationale; the 2nd discusses the methodology and findings of feasibility studies aimed at determining community needs, attitudes, and actions relevant to health; the 3rd covers the methodology and findings of feasibility work conducted to determine the particulars of health care delivery; and the 4th is a model based on the knowledge and insight gained in the foregoing research and consisting of a simplified, streamlined set of procedures for data collection and a relatively standardized but sophisticated analysis that maximizes the utility of the data obtained. Field work was carried out in rural teaching health centres and their catchment areas in India and Turkey. (HC-L)

- 3660 Renan Esquivel, J.** *Salud integral y medicina comunitaria en areas subdesarrolladas. (Integrated health care and community medicine in underdeveloped areas).* Panama City, Hospital del Nino, Nov 1976. 14p. Span.

This paper explores the concept of community health in a changing society and defines it as the result of the actions of a system that must continuously adjust itself to the needs of the community, utilizing to the fullest community resources. The four basic functions of the system

— analysis of health problems, development of health programmes, mobilization and coordination of community resources, and programme evaluation — are then examined individually. (HC-L)

- 3661 Rescher, N.** *Ethical issues regarding the delivery of health care services.* Connecticut Medicine (New Haven, Conn.), 41(8), Aug 1977, 501-506. Engl.

Conference on Ethical Issues in the Distribution of Health Care, Providence, R.I., 16 Apr 1975.

Three conflicts in the ethics of health care are discussed: the system versus the individual, quality versus equality, and the present versus the future. It is felt that health services have been too "systems-oriented" and that individuals should bear a greater responsibility for the state of their health. Equal access to health care should not compromise the general quality of the services available to everyone. Finally, it is important to balance resources spent on satisfying present health care demands with the need to invest more and more in long-term research without any immediate benefit. (FM)

- 3662 Roggen, L.G.** WHO, Brazzaville. *Development of basic health services in Kenya; family health.* Brazzaville, WHO, 17 Dec 1973. 14p. Engl. 18 refs.

The activities of Kenya's national family planning programme are examined in terms of basic principles, organization, programme planning, staff training, educational materials for health workers, health education, and evaluation and research. It is recommended that planning activities of the government and interested agencies be coordinated, administrative staff be increased, more nationals be appointed to positions of authority, the government take over family planning information programmes presently sponsored by private agencies, etc. (RMB)

- 3663 Rojas Ochoa, F., Cabezas Cruz, E., Duyos Gato, H.** *Atencion a la embarazada y al recién nacido en Cuba. (Care of the pregnant woman and newborn in Cuba).* Havana, Ministerio de Salud Publica, Centro Nacional de Informacion de Ciencias Medicas, n.d. 34p. Span. 16 refs. Octavo Congreso Latinoamericano de Obstetricia y Ginecologia (FLASOG), Havana, Cuba, 25-31 Jan 1976.

Cuba's national plan for maternal and child health includes action in the spheres of social protection, service coverage, technical standardization, health manpower training, and scientific research. This document discusses the aims and methods of the national plan and sets forward in 25 tables and a number of graphs some indicators of the current (1966-1974) status of maternal and child health. (HC-L)

- 3664 Saward, E., Sorensen, A.** *Current emphasis on preventive medicine.* Science (Washington, D.C.), 200(4344), 26 May 1978, 889-894. Engl. 74 refs.

The recent heightened interest in preventive medicine in the USA stems from the progressive disillusionment with curative medicine as a panacea and the decreasing returns from money invested in it. Nevertheless, the author points out that too little is known about disease and illness to be able to effect prevention for most conditions, despite recent efforts to improve the environment, moderate self-imposed risks such as smoking or drug addiction, and change consumer expectations. Also, since most direct preventive measures lie outside the realm of the medical profession in the areas of environmental health and nutrition, preventive medical care should concentrate on secondary measures such as immunization and the early detection of disease. The suggestion that preventive and curative medicine be divided into two different professions is noted. (DP-E)

- 3665 Schwefel, D.** *Planificación, administración y organización de los servicios de salud.* (Planning, administration, and organization of health services). Revista Centroamericana de Ciencias de la Salud (San Jose), 1(1), May-Aug 1975, 91-115. Span. 86 refs.

In the late 1960s, the Pan American Health Organization (PAHO) and the *Centro de Estudios del Desarrollo* (CENDES), Venezuela, developed a health planning technique that involves submitting alternative health priorities to a rigorous cost-benefit analysis. Benefit is measured in terms of numbers of deaths avoided with a view to arriving at the optimum allocation of scarce health resources. This paper describes the PAHO-CENDES method and analyzes why, despite its widespread endorsement, it has yet to be properly applied. (HC-L)

- 3666 Scotney, N.** *Group health education.* AFYA (Nairobi), 11, Nov-Dec 1977, 181-188. Engl. Originally published as Chapter 12 in entry 1933 (volume 3).

Group education is most effective when the group is small and shares a common interest or concern. Meetings should be brief and participants encouraged to ask questions and take part in demonstrations. Caution must be exercised with audiovisual aids; while they can be effective in getting attention or in emphasizing a point, they should not be relied upon to do the teaching. (DP-E)

- 3667 Scotney, N.** *Community health education.* AFYA (Nairobi), 11, Sep-Oct 1977, 150-157. Engl. Originally published as Chapter 11 in entry 1933 (volume 3).

Community health education is largely a matter of working with political and social leaders, groups, and organizations. A health education programme should be focused on a recognized problem and be well planned. Health education in the schools should be aimed primarily at the teaching staff. Only with the support of community members can a health education programme achieve significant results. (DP-E)

- 3668 Sehgal, B.S.** WHO, Brazzaville. *Health education in Liberia; report on a mission 7-17 July 1974.* Brazzaville, WHO, 8 Apr 1975. 12p. Engl.

This report presents the findings and recommendations of a 1974 WHO mission to Liberia to suggest ways and means of strengthening planning, implementation, and evaluation of the educational component of health and health manpower development programmes and to propose measures for improving collaboration in health education among the ministries of health, education, information, and agriculture extension. The mission reviewed the 10-year national health plan (1967-1976), job descriptions of Community Health Department staff, and work plans covering communicable diseases, family health, environmental health, and health education. Recommendations are made concerning disease control, family health, school health education, community education programmes, environmental health, mass media, etc. (RMB)

- 3669 Sepulveda S., J.** *Situación en salud y política de atención médica integral.* (Health situation and the policy of integrated medical care). Revista Centroamericana de Ciencias de la Salud (San Jose), 1(1), May-Aug 1975, 117-130. Span.

This paper sets forth various data concerning morbidity, mortality, and availability of health resources in Central America, indicating the incompleteness of these data and questioning their value as valid health indicators. The need for a permanent system for gathering data of a kind that can be used as a basis for health planning is pointed out and a number of guidelines for establishing more appropriate national health systems are suggested. (HC-L)

- 3670 Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia.** *Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. Sistema rural de servicios de salud: una estrategia de desarrollo rural para mejorar el bienestar.* (Rural health services system; a rural development strategy for improving well-being). Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 64p. Span. Refs.

See also entries 3678, 3843, 3901, 3924, 4019, 4020, 4021, 4022, 4023, 4024, 4025, 4026, and 4030.

The level of well-being enjoyed by a population is the result of a number of factors: conditions of production, income, access to goods and services, standard of living, social status, health, lifestyle, institutions, and government policies. A study of the interrelationships between these factors was conducted over a 2-year period in the rural department of Cauca, Colombia. The study resulted in the elaboration of a concept of rural development as improved well-being and a rural development strategy based on a multidisciplinary approach to problem-solving and the formation of voluntary associations for self-help. Both these results are developed at length in this document. (HC-L)

- 3671** Universidad Nacional Autonoma de Nicaragua, Managua. *Conclusiones y recomendaciones del primer Seminario Nacional de Salud en la Comunidad. (Conclusions and recommendations of the first National Seminar on Community Health)*. Revista Centroamericana de Ciencias de la Salud (San Jose), 1(2), Sep-Oct 1975, 181-186. Span.

Nicaragua's 1st national seminar on community health brought together students, professors, public servants, community leaders, auxiliary health workers, school-teachers, and representatives of various international organizations to discuss the relationship between the medical and social sciences, the functions of the health team, the role and value of extramural programmes offered by the *Universidad Nacional Autonoma de Nicaragua*, and community participation in the health services. Eleven conclusions and nine recommendations relevant to these themes are put forward. (HC-L)

- 3672** USA, Agency for International Development, Department of State. *Guatemala — health services*. Washington, D.C., Agency for International Development, Department of State, 3 Jun 1971. 1v.(various pagings). Span.

The details of an AID-supported project to improve health services in rural Guatemala are set forth in this project proposal. The goal of the project is to help establish a four-level health system consisting of hospitals, health centres, health posts, and health promoters and traditional midwives. The technical, training, planning, and financial aspects of the project and the role of the Ministry of Health are discussed. Separate sections of the proposal cover the project background, an economic and social evaluation of Guatemala, problems and issues, and implementation. Statistical data are included. (RMB)

- 3673** Van Dam, B.E., Geissler-Brun, C. WHO, Brazzaville. *Nutrition programme: Mauritius; report on a mission 18 March-30 May 1974*. Brazzaville, WHO, 6 Sep 1974. 39p. Engl.

In preparation for a nutrition and health education project, WHO sent two consultants to Mauritius to help design a coordinated programme in food planning, nutrition, and health education and to discuss with the authorities concerned the ways and means of its implementation. The background information they collected on the food situation, the country's health and nutritional status, and nutrition activities of various organizations are presented in this report, which also contains a description of the draft project proposal and their recommendations concerning the national food and nutrition policy, international assistance, etc. Annexes cover: food supplies, consumption, and habits; health and nutritional status; and the draft project proposal. (RMB)

- 3674** Viau Davila, A. *Propuesta para organizar el sistema de planificacion en salud de la Republica de Guatemala, C.A. (Proposal for organizing the*

health planning system in the Republic of Guatemala, Central America). Guatemala City, Ministerio de Salud Publica y Asistencia Social, 14 Jun 1973. 1v.(various pagings). Span.
Unpublished document.

A planning system has been developed to assist Guatemalan decision-makers in the design and selection of health policies and programmes. The functions of the system are as follows: to design and test ways of improving the health services; to design and implement an information system that would provide data on health status and the objectives, costs, limitations, and accomplishments of various health programmes; to subject health programmes to cost-benefit and systems analyses; and to train personnel for long-term planning in the health sector. These aspects of the planning system, plus some general considerations governing it and a plan of action for implementing it, are developed in this proposal. (HC-L)

- 3675** Vutuc, C. *Medizinische Versorgung in Entwicklungslandern; Darstellung der Problematik am Beispiel von Bangladesh. (Public health in developing countries; analysis of problems in Bangladesh)*. Offentliche Gesundheitswesen (Stuttgart, Germany), 40(2), 1978, 71-78. German. 11 refs.

The health situation in Bangladesh is analyzed and recommendations for the future are made, including the training of paramedical personnel in place of physicians and the adaptation of all medical training to local needs. (Modified journal abstract.)

- 3676** WHO, Copenhagen. *Continuing education of health personnel; report on a working group*. Copenhagen, WHO, 1977. 29p. Engl.

This report details existing patterns of continuing education and the various national policies related to them, the roles of professional associations, and shortcomings in educational planning. The lack of standards for evaluating the performance of health personnel to determine their need for continuing education is mentioned. A systems approach to the planning of continuing education is recommended. For each major health problem, acceptable standards of care would be established, present personnel performance evaluated, and educational needs identified and an educational programme would then be designed to correct any deficiencies. The working group stresses the responsibility of health workers to continue their education and outlines the roles of universities. (RMB)

- 3677** World Bank, Washington, D.C.. *Alternate approaches to sanitation technology; a progress report on World Bank Research Project 671-46*. Washington, D.C., World Bank, 10 Jan 1978. 19p. Engl.

The World Bank has undertaken a 2-year research project into low-cost alternatives to conventional systems of water supply and waste disposal. The project includes

field work and pilot projects in 21 countries characterized by various stages of development, technologies, cultures, institutions, and environmental features; it is expected to generate information that will assist decision-makers in development agencies, developing countries, engineering firms, and universities in the technical and economic evaluation of alternative water supply and waste disposal projects. This document discusses the aims and preliminary findings of the project and gives some interim guidelines for sanitation project design in developing countries. (HC-L)

- 3678 Zapata, F.** Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; informe epreliminar de saneamiento ambiental. (Rural health services system; preliminary report on environmental health)*. Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Sep 1977. 22p. Span.
See also entries 3670, 3843, 3901, 3924, 4019, 4020, 4021, 4022, 4023, 4024, 4025, 4026, and 4030.

Colombia seeks to provide its rural communities with sanitation services through a strategy that is based on these principles: maximum coverage with services conforming to a minimum set of standards, the promotion of water supply and sewage disposal together, community participation in the identification and solution of environmental health problems, optimal utilization of the rural health promoter in the education and mobilization of the community and the implementation of the services, a regionalized approach corresponding to the varying degrees of complexity of environmental contamination, and system replicability. This document describes in detail the materials and methods involved in implementing the strategy. (HC-L)

II.4 Geographic Distribution of Health Services

See also: 3503, 3539, 3546, 3553, 3568, 3714

- 3679 Bekker G., L.F., Ordóñez A., E., Tejada Z., H.** *Síndrome, o diagnóstico de salud en Honduras? (Health syndrome or health diagnosis in Honduras?)*. Revista Centroamericana de Ciencias de la Salud (San Jose), 2(3), Jan-Apr 1976, 121-161. Span. 47 refs.

In an effort to impart a global understanding of the health problems of Honduras, this paper examines the historic bases for the country's underdevelopment and economic dependence and shows how health problems are rooted in an economic system that functions to the benefit of foreign powers and a small minority of Hondurans. Nine graphs and 21 tables of data on the

country's geography, social structure, income distribution, land distribution, land use, demography, fertility, mortality, and health services distribution are included. (HC-L)

- 3680 Ecuador, Ministerio de Salud Pública, Dirección Nacional de Salud Rural.** *Atención de salud a nivel rural. (Health care at the rural level)*. Quito, Ministerio de Salud Pública, Dirección Nacional de Salud Rural, 1976. 44p. Span.
Convenio "Hipólito Unzué," Reunión del Comité Técnico de Salud Rural del Área Andina, Quito, Ecuador, 9-13 Feb 1976.

In February 1976, ministers of health from Bolivia, Colombia, Chile, Ecuador, and Venezuela met to discuss health care in their respective rural areas. This report contains summaries of each country's presentation of its current efforts in the field of rural health, tables of data on health personnel and personnel:population ratios, schematic diagrams of the organs of the ministries of health that are responsible for rural health programmes, and some general considerations and recommendations applicable to the rural health situation in all five countries. (HC-L)

- 3681 Gish, O., Godfrey, M.** *Reappraisal of the brain drain; with special reference to the medical profession*. Brighton, UK, University of Sussex, Institute of Development Studies, Apr 1976. 39p. Engl. 29 refs.

Policies designed to curb physician migration from the developing to the developed countries have so far failed because they have given too much consideration to individual economic motives and not enough to the context that fosters mobility. This context is the international market in professional skills into which the elite of the Third World by virtue of international qualifications are more or less integrated. This paper contains a number of recommendations for altering the circumstances that currently favour the brain drain. For developing countries, these include ending the use of developed countries' qualifications in local training institutions, disallowing recruitment for foreign posts within their borders, disaffiliation from international associations that are dominated by developed countries, setting up associations committed to the interests of developing countries, formulating courses and qualifications that are relevant to local needs and therefore less likely internationally negotiable, establishing new centres of higher learning on a regional basis, using the national language as the medium of instruction in courses and textbooks, discouraging overseas study for the acquisition of negotiable qualifications, and restricting the output of professionals to those who can be absorbed at home. Complementary action on the part of the developed countries would include: ceasing recruitment efforts in developing countries; withholding recognition of national qualifications of those developing countries who wish it withheld; offering technical and educational assistance appropriate to the development of more relevant job descriptions, training centres, courses and textbooks,

etc.; and continuing the effort to become self-sufficient in health professionals. (HC-L)

- 3682 Good, C.M.** *Traditional medicine; an agenda for medical geography*. Social Science and Medicine (Oxford, UK), 11(14-16), Nov 1977, 705-713. Engl. 72 refs.

As part of international efforts to incorporate traditional practitioners into primary care systems, the author advocates the use of medical geography to provide quantitative, mappable information about: the numbers, types, and location of traditional practitioners; the effects of location, distance, and environment on morbidity and the utilization of traditional and/or modern services; and traditional practitioner:population ratios. This basic information would help medical geographers to analyze the geographical and social aspects of different systems and patterns of traditional medicine and their implications for human health. Health planners could use the resulting data to assess the feasibility of proposals for involving traditional practitioners in the national health care system and medical geographers are strongly urged to orient their efforts in this direction. (HC-L)

- 3683 National Health Council, Health Manpower Distribution Project, New York.** *Listing of financial incentives and examples of other incentive programs*. New York, National Health Council, Health Manpower Distribution Project, Feb 1977. 50p. Engl.

Many approaches to the problem of maldistribution of health personnel have been tried; some show promise. The incentives described in this listing represent a variety of ways, mostly financial, of influencing medical students and professionals to practice in underserved rural and inner city areas. It is hoped that the listing will stimulate thinking about alternative approaches to the distribution problem. For a more comprehensive listing of placement services or preceptorship programmes, interested parties can write the Health Manpower Distribution Project, National Health Council, 1740 Broadway, New York, NY 10019, for the following publications: *Roster of Placement Services* and *Directory of Preceptorship Programs in the Health Professions*. (DP-E)

- 3684 Organizacion Panamericana de la Salud, Washington, D.C.** *Recursos humanos en salud en las Americas; estadísticas basicas. (Human resources in health in the Americas; basic statistics)*. Washington, D.C., Organizacion Panamericana de la Salud, Departamento de Recursos Humanos, 1973. 1v.(various pagings). Span. Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973. Bound with entries 3519, 3533, 3893, 3955, and 3970 in entry 3532.

This document presents selected statistical data on population and human health resources in Latin America, including ratios of health manpower and hospital beds

to population and figures on geographical distribution of health manpower and physicians by specialty. These data reveal the recent trend towards the deployment of auxiliary health workers, although the physician is still seen as the principal provider of health care and therefore of most interest to health planners. It is recommended that health planners concern themselves less with numbers of available health workers and more with the health services themselves. (RMB)

- 3685 Panama, Contraloria General de la Republica, Direccion de Estadística y Censo.** *Asistencia social ano 1973. (Social welfare, 1973)*. Panama City, Contraloria General de la Republica, Direccion de Estadística y Censo, Estadística Panamena, Ano 33, Serie "A", 1974. 35p. Span.

This collection of 30 tables of statistical data is meant to give social welfare institutions an understanding of the organization and distribution of health services in Panama. Information is presented on: the number and distribution of practicing physicians, nurses, dentists, and health auxiliaries; availability and distribution of hospital beds; outpatient services; and patients admitted and discharged. (RMB)

- 3686 Patino, J.F.** *Surgical manpower drain*. Surgery (St. Louis, Mo.), 72(5), Nov 1972, 668-680. Engl. 29 refs.

Every year, 300 Latin American medical graduates emigrate to the USA, a number equivalent to the output of three medical schools. The cost of educating these physicians exceeds the amount of American health aid to Latin American countries. In this article, the author discusses the contribution and performance of foreign medical graduates in the USA and the implication of the brain drain for the developing countries. He concludes that the developing countries have apparently found it easier to increase the output of high level manpower than construct the economic and administrative infrastructure to utilize it. Suggestions for dealing with this problem are presented. (HC-L)

- 3687 Pinchoff, D.M., Ingall, J.R., Crage, W.D.** *Observations on a rural health manpower project*. Journal of Medical Education (Chicago, Ill.), 52(2), 1977, 117-122. Engl.

The Rural Externship Program, covering western New York and northwestern Pennsylvania (USA), was conceived with the immediate aim of giving health science students a chance to live and work in a rural setting and with the longer-term objective of encouraging them to pursue careers in rural areas. The 8-week programme is open to students who are enrolled in a health sciences school (medicine, nursing, dentistry, physiotherapy, etc.) and have completed at least 1 year of study. Externs are assigned a preceptor from their own discipline for the duration of the programme but are encouraged to work with preceptors and externs of other disciplines as well. In 1975, after the programme had been in operation for 5 years and had been completed by 140 students, a telephone survey of former externs who had since graduated was conducted. Out of 61 externs, 55%

were found to be in rural practice and 53% of these indicated that their rural externship had influenced their choice of location. They also reported that their rural externship had given them a greater appreciation of disciplines other than their own and of the health care system as a whole, enabling them to use hospital and community resources more effectively. Eighty-seven percent of the programme participants and 74% of its preceptors recommended that the programme be incorporated into the health sciences curricula of their respective schools. (HC-L)

3688 Ramirez de Arellano, A.B., Miranda, L.S. *Primary care in Puerto Rico*. San Juan, Puerto Rico, Department of Health, 24 May 1978. 21p. Engl. 16 refs.

Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978.

Unpublished document.

Puerto Rico, which began implementing the regionalization concept of health care more than 30 years ago, provides a case study in the evolution of primary care within a general health care system. This paper traces the development of primary services in Puerto Rico, highlighting factors that have promoted, hindered, or otherwise conditioned their role within the overall system. After a description of the Puerto Rican setting, the initial stages in the development of a network of primary systems and the establishment of a regionalized health care system are discussed. In the final sections, the authors examine trends that have eroded the regional scheme and summarize recent efforts aimed at reasserting the primacy of primary care within the regional system. (DP-E)

3689 Spears, R.M., White, E.E., Focke, K.G. *Rural health care development program*. Medical Group Management (Amherst, Mass.), 22(5), Jul-Aug 1975, 17-20. Engl.

The Rural Health Care Association (RHCA), established in 1971 in Denver, Colorado (USA), assures an integrated approach to health care delivery in small towns. It feels that the answer to the problem of attracting physicians to rural areas is to develop model health care systems consisting of small groups of doctors practicing in isolated areas. They would be linked both to urban centres and to even smaller communities equipped with satellite offices staffed by auxiliary health workers. RHCA provides technical assistance to communities wishing to establish such systems and advises them on health manpower problems. It also: provides market analysis; advises the community on its economic, professional, and environmental attractiveness; and acts as an advertising agency to match physicians with communities. (FM)

3690 Territorios Nacionales Informativo, Bogota. *Recursos para servicios de salud en los territorios nacionales. (Health resources in the national*

territories). Territorios Nacionales Informativo (Bogota), (5), Apr 1974, 34-40. Span.

In recent years, health care in the Colombian territories — Amazonas, Arauca, Caqueta, Guainia, Putumayo, San Andres y Providencia, Vaupes, and Vinchada — has received special attention as part of the nation's plans for development. This paper documents, in five tables: the kind and numbers of health personnel in each of the eight territories (1973); the number of hospitals, health centres, health posts, and beds per territory (1973); the cost per institution for the year 1974; government health expenditure per territory for the year 1974; and the health budget (income and expenditure) for each territory for the year 1974. (HC-L)

3691 Valladares, R. *Asociacion Venezolana de Facultades (Escuelas) de Medicina, Caracas. Federacion Panamericana de Asociaciones de Facultades de Medicina, Bogota. Estado actual de la atencion para la salud. (Present status of health care)*. Caracas, Ministerio de Salud y Asistencia Social, Sep 1974. 16p. Span.

Quinta Conferencia Panamericana de Educacion Medica, "Educacion Medica de Hoy y Atencion Medica del Manana," Caraballeda, Venezuela, 4-7 Nov 1974.

Unpublished document.

If data on the availability of health resources are to be meaningful, they must be expressed in terms of their organization, distribution, and role within a system, not merely in terms of numbers. With this in mind, the quantitative and qualitative aspects of medical coverage in Latin America are reviewed and the responsibility of the medical faculties *vis-a-vis* the provision of health services is discussed. (HC-L)

3692 Vargas Tentori, F. *Extension de la cobertura, atencion primaria de salud y participacion de la comunidad; definiciones y conceptos operativos. (Extension of coverage, primary health care, and community participation; definitions and operational concepts)*. Boletin de la Oficina Sanitaria Panamericana (Washington, D.C.), 82(5), May 1977, 386-396. Span. 41 refs.

New policies are necessary to accelerate, adapt, and balance economic and social development with the health levels of the peoples of Latin America. Expansion of present health services is the most suitable procedure for providing health care to the unserved populations of rural areas and the underserved populations of urban areas and the national governments and PAHO/WHO have agreed to assign it top priority. Definitions and operational concepts of health services, extension of coverage, and primary care are given. Within this context, community participation is considered a key element and it is suggested that community studies be undertaken with a view to improving community health programmes. (Modified journal abstract.)

II.5 Financial Aspects

See also: 3568, 3585, 3624, 3738

- 3693 Colombia, Departamento Nacional de Planeacion.** *Proyecto de cuantificacion y analisis del sector salud; clasificacion de insumos especificos del sector salud. (Project of quantification and analysis of the health sector; specific items of expenditure in the health sector).* Bogota, Departamento Nacional de Planeacion, Documento General de Trabajo No.47, Sep 1974. 56p. Span. 15 refs.

A list of items of expenditure is a necessary prerequisite to the statistical implementation of linear programming in the Colombian health sector. This document contains such a list, grouping items in alphabetical order under these headings: chemical and pharmaceutical products (837 items); instruments used in surgery, dentistry, diagnosis, and treatment (958 items); clothing (22 items); glass, rubber, plastic, and metal supplies (239 items); movable equipment (193 items); non-movable equipment (184 items); and special vehicles (2 items). An average useful life expectancy for each group is included. (HC-L)

- 3694 Colombia, Departamento Nacional de Planeacion.** *Presupuesto nacional colombiano para programas de produccion de alimentos y politicas de nutricion. (Colombia's national budget for food production programmes and nutrition policies).* Bogota, Departamento Nacional de Planeacion, Documento DNP-1.075-URH-DS, 4 Jul 1973. 1v.(various pagings). Span.

These statistics on Colombia's food and nutrition budgets from recent years were collected to assist health planners to establish national policies for food production and distribution, nutrition education, and nutritional aid to disadvantaged groups. The 1st part contains data on food production and availability and the training of agricultural resources planners and administrators. The 2nd and 3rd parts cover private and public resources that can be used to encourage agricultural production and supplementary feeding programmes. (RMB)

- 3695 Ruderman, A.P.** *Cost-effectiveness of an integrated programme for the delivery of primary health care in northern Canada; the Sioux Look-out zone in 1973.* Halifax, N.S., Dalhousie University, Faculty of Administrative Studies, 24 May 1978. 9p. Engl.
Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978.
Unpublished document.

Despite problems of climate and distance, this government primary health care programme supported by community health aides, outpost nurses, a rural hospital, and the Faculty of Medicine of the University of Toronto provides cost-effective health care services to some 8 000 Indians in scattered communities of north-western Ontario (Canada) that are roughly equivalent

to those available to the general population of the province. Cost containment is made possible by skilled logistic planning, devolution of functions from higher-level to lower-level personnel, effective supervision, and the existence of a basic infrastructure of transportation, communication, and government services. The author feels that this model can be replicated in countries with the requisite funds, health manpower, administrative confidence, and motivation. (Modified author abstract.)

- 3696 Sorkin, A.L.** *Health economics in developing countries.* Lexington, Mass., D.C. Heath, 1976. 200p. Engl. Refs.

See also entry 3348 (volume 5).

This book presents an economic analysis of the health sector in the developing countries. Chapter 1 examines the health and economic problems of developing countries; the relationship between nutrition and development is analyzed in chapter 2. Chapter 3 is concerned with the impact of health services on economic development and possible harmful effects of development projects on health. The relationships between population growth and economic development, population growth and income distribution, and economic development and fertility are examined in chapter 4. Chapters 5 and 6 treat health planning and the financing of health services. Chapter 7 focuses on the relative merits of health centres versus hospitals and chapter 8 discusses various issues concerning health manpower in developing countries. The book is written in a simple, clear, and straightforward manner; each chapter is followed by a summary of its contents. (HC-L)

- 3697 Swanberg, K.G.** *Economic factors in the causality of malnutrition.* In *Proyecto de Desarrollo Rural Oriente de Cundinamarca*, Bogota, PDROC Salud y Nutricion, n.d. 1v.(various pagings). Engl.

CARE Nutrition Planning Workshop — Latin America/Caribbean, Bogota, Colombia, 21 May 1975.

Unpublished document; see also entry 3790.

The conclusions of five studies conducted in urban and rural areas of Colombia are cited as evidence that the basic cause of malnutrition is low income. Since income increments sufficient to meet even minimum requirements — US\$37.5 million for Bogota alone — are not feasible, it is recommended that subsidized food distribution, in the form of preschool feeding programmes, be maintained until such time as alternative cropping patterns and the introduction of new technology make more, and more nutritious, food available. An analysis of demand elasticity and price flexibility is used to show that increased production can benefit both the farmer, in terms of income increment, and the consumer, in terms of lower food prices. In order to help stimulate these changes in the agricultural sector, the author recommends coordinated programmes in technical assistance, supervised credit, vertical market integration, and risk sharing. (HC-L)

- 3698 Thorne, M.C.** *Low cost health services delivery systems; characteristics, functional components, problems and key questions.* Baltimore, Md., Johns Hopkins University, 3 May 1978. 17p. Engl.

Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978.

Unpublished document.

The characteristics, functional components, and problems of a low cost, widely available health service system are outlined. While a minimum set of services is maintained, the cost must be kept to a minimum with most of it borne at the point of services. Local resources should be fully utilized and facilities must be cheap and easily constructed and maintained. Potential problems are many: lowering costs, determining roles and tasks of auxiliaries, compensation and incentives, supplies, facilities, transportation, recruitment, training, supervision, working relationships, minimum useful information, and evaluation and redesign. (DP-E)

- 3699 Yudkin, J.S.** *Provision of medicines in a developing country.* Lancet (London), 15 Apr 1978, 810-812. Engl. 47 refs.

The author points out that much of the drug budget of an unspecified developing country, where he had a clinical appointment, is spent on Western-manufactured preparations for hospital use, thus draining resources from preventive medicine and health care in rural areas. A major reason for this is the promotional activities of pharmaceutical companies, who have 5 times more representatives in this country than in the UK. Many drugs are recommended for diseases for which they are not indicated and in which their use may be hazardous and information on side-effects and contraindications is inadequate. The author urges that information supplied by drug firms to health workers in different countries be standardized and that developing countries spend their drug budgets more wisely. (Modified journal abstract.)

II.6 Cultural Aspects

See also: 3512, 3682, 3722, 3839, 3916, 3929, 3960

- 3700 Bannerman, R.H.** *WHO's programme.* World Health (Geneva), Nov 1977, 16-17. Engl.

Also published in Arabic, French, German, Italian, Persian, Portuguese, Russian, and Spanish.

Traditional birth attendants were the 1st traditional practitioners to be incorporated into the modern health system because of a lack of trained personnel. Their success prompted the formation of a WHO working group to explore the merits of traditional medicine and help participating countries integrate it into modern medicine with an eye to promoting beneficial practices and discouraging harmful ones. A questionnaire has been designed to collect data on traditional practitioners that

will be used to classify them and develop training programmes. Priority will be given to research into herbal medicines. (RMB)

- 3701 Camacho C., E.M., Alfaro M., J.** *Seguridad social en Costa Rica y la llamada "deshumanización" de los servicios medicos. (Social security in Costa Rica and the so-called "depersonalization" of medical care).* Revista Centroamericana de Ciencias de la Salud (San Jose), 3(8), Sep-Dec 1977, 75-96. Span. 35 refs.

The Costa Rican health system has been accused of being responsible for the heavy workloads, excessive administration, and social gap between doctor and patient that have led to the "depersonalization" of the doctor-patient relationship. This paper argues that these phenomena are the result of social injustice as well as the structure of the health care system by showing how the practice of medicine is deeply rooted in the capitalist economy and how socialized medicine has been adopted as a means of compensating for some of the injustices inherent in capitalism. Real improvement in the health sector, if it is to occur, will have to be associated with sociopolitical changes in society at large. (HC-L)

- 3702 Children in the Tropics, Paris.** *Listening to the village and making it conscious of its needs and possibilities.* Children in the Tropics (Paris), (108-109), 1977, 23-26. Engl.

There are a number of points to be borne in mind when approaching a village to obtain its participation in a primary health care programme. The health promoter should be announced in advance, observe the customary formalities of the villagers, and use an interpreter if necessary. He or she must also take note of cohesive and divisive factors in the village and avoid delicate subjects. After determining how a village can contribute to a programme, the last step is to become familiar with traditional practices and decide, in consultation with the villagers, how to best combine them with the new forms of health care to be introduced. (DP-E)

- 3703 George, J.C.** *Ray of hope.* World Health (Geneva), Jun 1977, 18-21. Engl.

Ayurveda, meaning the science of life, is a branch of Indian traditional medicine. Ayurvedic medicine, which stresses treatment of the patient as a whole rather than his disease, has apparently been successful in relieving the suffering caused by rheumatoid arthritis. WHO, as part of its programme to stimulate and encourage research in traditional medicine, has initiated research in collaboration with the Indian Council of Medical Research to substantiate scientifically whether Ayurveda provides a satisfactory cure for this disease. The research taking place in a hospital in southern India provides a ray of hope for sufferers of rheumatoid arthritis. (DP-E)

- 3704 Guevara, C.C.** *de Creencias y practicas en la medicina tradicional de El Salvador. (Beliefs and practices in the traditional medicine of El Salvador).* Revista Centroamericana de Ciencias

de la Salud (San Jose), 2(5), Sep-Dec 1976, 127-131. Span.

This paper describes some of the characteristics of traditional medicine in El Salvador, pointing out: that traditional medicine rests on a body of knowledge derived from various religious, magic, and scientific sources; that it is constantly absorbing new knowledge and techniques; that it possesses valuable information on locally-available medicinal plants and substances; that its appeal cuts across all social and political lines; that, unlike modern medicine, it aims to treat the individual rather than the disease; and that it is, itself, an expression of the Salvadorean culture. The paper was prompted by the WHO's suggestion that countries make use of all medical resources at their disposal, including traditional ones. (HC-L)

3705 Leslie, C., ed(s). *Asian medical systems; a comparative study*. Berkeley, Cal., University of California Press, 1976. 419p. Engl.

Toward the Comparative Study of Asian Medical Systems, 53rd Burg Wartenstein Symposium, Burg Wartenstein, Austria, July 1971.

An expanded record of a symposium on Asian medical systems, this volume consists of 7 parts with introductory chapters by the editor. Part 1 deals with the history and traditions of Hindu, Arabic, and Chinese medicine. Part 2 contains two papers on cosmopolitan or "scientific" medicine, including a comparison of US and Soviet models. Part 3 covers the adaptive significance of medical traditions, while part 4 examines plural medical systems. Part 5 compares traditional and modern medicine. Medical revivalism in China and India form the basis for part 6 and the book concludes with a philosophical discussion of world views and Asian medical systems. (Modified journal abstract.)

3706 Lightman, S. *Responsibilities of intervention in isolated societies*. CIBA Foundation Symposium (London), 49, 1977, 303-332. Engl. Refs.

This article examines the destructive effect of expansion by the developed world into the remaining refuge areas of the earth with emphasis on the damage done to the physical, mental, and social health of tribals. The author contends that efforts to improve health will be useless unless the initiative comes from inside the community. If Western medicine is to be effective, its proponents must have a basic understanding of the people they are trying to help. Effective medical programmes will fit into the context of the culture, be based on local needs, and use local resources. Further discussion of these ideas follows the article. (DP-E)

3707 Lozoya, X. *Balance between man and nature*. World Health (Geneva), Nov 1977, 8-11. Engl.

Also published in Arabic, French, German, Italian, Persian, Portuguese, Russian, and Spanish.

The study of traditional medicine in Mexico is especially interesting because of its rich heritage of curative plants, its continued use by a large proportion of the population who have no access to Western medicine, and the wealth of available historical, archaeological,

botanical, and traditional information. The Mexican Institute of Medicinal Plants is conducting a systematic study of these plants in order to establish a data bank of research studies into herbal remedies. Some of the most popular Mexican plants, particularly those with cardiovascular, anti-parasitic, and anti-diabetic properties, are described. (RMB)

3708 Maldonado, C. *Estudio sobre la medicina popular en el Valle de Comayagua, Republica de Honduras*. (Study of traditional medicine in the Comayagua Valley, Republic of Honduras). Revista Centroamericana de Ciencias de la Salud (San Jose), 2(3), Jan-Apr 1976, 105-116. Span.

Six *curanderos* and 108 adults in the Comayagua Valley, a rural area in Honduras, were interviewed regarding traditional concepts of disease; some 14 were identified, of which the aetiology, symptoms, treatment, and prevention of four are described. It is noted that: few traditional disease concepts correspond to scientific ones; the services of a doctor are only sought, as a last resort, in case of 2 of the 14 diseases; and the reasons cited for not consulting a doctor in the case of the other 12 are doctors' ignorance of those diseases and fear of being laughed at. Greater knowledge of traditional disease concepts on the part of doctors could improve doctor-patient communication and scientific investigation into the 46 medicinal plants customarily used to treat the 14 diseases might also prove worthwhile. (HC-L)

3709 Mohseni, M. *Patients and their resort to health care; attitudes towards the use of the medical and sanitary services in Iran*. International Social Science Journal (Paris), 29(3), 1977, 473-482. Engl. 16 refs.

A 1975 survey was conducted of 1 085 urban and 871 rural randomly-selected heads of household to determine the relationships between levels of education, residence, and age and attitudes toward the use of medical and sanitary facilities. It was found that urban, well-educated young people made the greatest use of medical facilities. The author suggests that the reluctance of the elderly and of rural inhabitants to utilize health services stems partly from their adherence to traditional roles and that changes must be incorporated into community practices and attitudes rather than imposed by authorities. Statistical data are included. (DP-E)

3710 New, P.K. *Traditional and modern health care; an appraisal of complementarity*. International Social Science Journal (Paris), 29(3), 1977, 483-495. Engl. 54 refs.

It is often erroneously assumed that, where modern health care is available, traditional healers will be shunned. However, traditional healers are still widely employed and often with better results than can be obtained with modern medicine. Ideally, where a dual system exists, the two methods can be complementary, a situation that has been fostered in several countries, notably the People's Republic of China. Western-style professionals must be prepared to take a broader view of health care and authorities must be prepared to license

traditional healers and incorporate them into the established system. (DP-E)

- 3711 New, P.K.** *Barefoot doctors and health care in China*. Eastern Horizon (Hong Kong), 13(3), 1974, 7-21. Engl. 15 refs.

Among the factors that have contributed to the success of citizen participation, particularly the barefoot doctor movement, in the People's Republic of China are: widespread acceptance of an ideological position that puts service to the people above individual achievement; the absence of licensure, which allows for innovation and adaptation in the health system; and the mechanism of self-criticism, which permits a continuous pragmatic approach to problem-solving. Since prevailing conditions in the West are diametrically opposed to those in the People's Republic of China, it is unlikely that the barefoot doctor movement, or similar efforts at involving citizens in the health services, will be successfully implemented there. (HC-L)

- 3712 Odebiyi, A.I.** *Socio-cultural factors affecting health care delivery in Nigeria*. Journal of Tropical Medicine and Hygiene (London), 80(11), Nov 1977, 249-254. Engl. 16 refs.

One impediment to the success of Western medicine in Nigeria is the belief that only traditional practitioners can cure certain lingering diseases that are attributed to supernatural or biological causes. Other reasons for the preference for traditional over modern practitioners originate in the modern health care facility and include incivility on the part of junior and auxiliary staff, extensive red tape, language barriers between doctor and patient, lack of continued interest, distance, and cost. Unfavourable attitudes on the part of certain religious groups (Moslem) and sects (Aladura Christians, Jehovah's Witnesses) constitute a 3rd deterrent to the utilization of modern facilities. Finally, certain traditional customs are themselves health hazards: force-feeding infants by hand, which can lead to choking and respiratory infections; feeding infants pre-chewed food; infant food taboos; female circumcision; and fattening up young women prior to marriage. It is suggested that further research into these and other impediments to the adoption of modern health practices be undertaken. (HC-L)

- 3713 Osborne, O.H.** *Social structure and health care systems; a Yoruba example*. In Messing, S.D., ed., *Rural Health in Africa*, East Lansing, Mich., Michigan State University, African Studies Centre, Rural Africana: Current Research in the Social Sciences, No.17, Winter 1972, 80-86. Engl. For complete document see entry 3029 (volume 5).

Many Yoruba people of Nigeria either live in the city or wish to. They are also inclined to seek health care in the city. In this particular society, physical well-being is the responsibility of the oldest successful male in the family. Societal health is also influenced by native healers, who are subject to a hierarchy, by certain divinities, and by witches, both good and bad. These customs and beliefs

have real impact on modern health care systems that presently exist among the Yorubas. The situation suggests that such systems should be adapted to the culture, traditions, and values of the health seekers. (DP-E)

- 3714 Sangsingkeo, V.** *Interrelationship of traditional medicine and modern medicine in the developing world*. Medical Association of Thailand Journal (Bangkok), 59(1), Jan 1976, 19-25. Engl.

A comparison of traditional and modern medicine shows that much can be gained from their amalgamation. Traditional practices such as acupuncture, medicinal herbs, traditional birth attendants, meditation, and magic are described. Modern medicine is characterized by the scientific method, specialization, highly trained personnel, and sophisticated equipment. Public health developments have contributed to the control of communicable diseases and a decrease in mortality. Modern medicine can perform or control nearly every disease, but it cannot reach the majority of people as traditional medicine can. The combination of both types, as evidenced in China, would greatly benefit undeveloped rural areas. (FM)

- 3715 Simoni, J.J., Ball, R.A.** *Difusion de informacion sobre la salud; lo que los merollicos nos pueden enseñar. (Spread of health information; what hucksters can teach us)*. Salud Publica de Mexico (Mexico City), 10(2), Mar-Apr 1977, 273-279. Span. 17 refs.

In 1974, 100 people were interviewed in three Mexican states to assess their response to medicine pedlars, who are flamboyant, almost comical, hucksters of medicines on public streets. Of all sources of information on health, the pedlars were considered the most reliable because they are accessible and talkative. Their sales talks represent a method of communication that is neither mass media nor person-to-person and the authors suggest that health education based along these lines would be acceptable to the lower classes; existing pedlars could even be incorporated into public health programmes especially in the fields of venereal diseases, dental health, and general hygiene. (Modified journal abstract.)

- 3716 Vachrotai, S.** *Primary health care as a part of general health care system*. Bangkok, Ministry of Public Health, Department of Health, 25 May 1978. 8p. Engl.

Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978.

Unpublished document.

A primary health care system should deliver basic health services and health education to the common people; therefore it must be compatible with local culture, traditions, and values. Too often, health officials attempt to provide this care without understanding the recipients and overlook the potential of the people as a

health resource. Also, the medical community is mistakenly reluctant to incorporate respected and trusted traditional practitioners and health workers into the system. Ideally, the primary health care system should remain independent of the government health care system and government health care personnel should be trained to assist the community in fulfilling its needs as it perceives them. (DP-E)

- 3717 **Vargas Tentori, F.** *Guaquitepec lucha contra el sarampion. (Guaquitepec fights measles).* Salud Mundial (Geneva), Aug-Sep 1977, 31-35. Span.

Also published in Arabic, English, French, German, Italian, Persian, Portuguese, and Russian.

During his year's obligatory service in a rural Mexican village, a recently-graduated doctor was able to bridge the gap between modern medicine and the ancient Mayan beliefs of his Indian patients by saving the life of an accident victim. Because he had gained the villagers' confidence, he was able to persuade them to help him organize and maintain, in the local church, an emergency pediatrics hospital during a measles epidemic. Three traditional healers were assigned specific medical tasks and contributed elements of their own practices that were of psychological benefit to the patients and their families. All of the 33 measles cases treated in the hospital survived; two of the seven children whose families refused medical assistance died. The success of this effort encouraged the villagers to initiate other community health projects, including the training of nine auxiliary health workers (among them four traditional practitioners) and the construction of two rural health posts and a piped water system. (RMB)

- 3718 **Were, M.K.** *Rural women's perceptions and community-based health care.* East African Medical Journal (Nairobi), 54(10), Oct 1977, 524-530. Engl. 16 refs.

A survey of 400 Kenyan village women to determine their attitudes towards equal rights for men and women revealed that most women felt that their opportunities within the community were limited in comparison with men's. However, they realized that better education for women would lead to increased opportunities and maintained that this would result in better health for their families in terms of physical and spiritual well-being, good grooming, and better housing. Such women would undoubtedly welcome health care services that could eventually expand to include environmental health and social services. (DP-E)

- 3719 **Williams, C.D.** *Cultural and other barriers in the implementation of health programs.* American Journal of Clinical Nutrition (Bethesda, Md.), 31(11), Nov 1978, 2037-2039. Engl.

The author stresses that the greatest obstacle to the implementation of health programmes in developing countries is a lack of adaptation and that more attention must be paid to defining local needs, resources, and attitudes. Improvement may be realized by overcoming the present failures to: diagnose causes of ill health; examine preexisting medical and health services; improve

and analyze statistics; examine and appreciate functions of preventive and curative medicine; adapt to harmless local ideas; provide continuity of care through home, health centre, and hospital; visit the homes; and select, train, and supervise staff at all levels. (AF)

II.7 Epidemiological, Family Planning, MCH, and Nutritional Studies

See also: 3563

- 3720 **Abaru, D.E.** *Diagnosis of Bancroftian filariasis: a review.* East African Journal of Medical Research (Nairobi), 4(1), Jan 1977, 9-12. Engl. 20 refs.

Methods used to diagnose Bancroftian filariasis vary with the nature of the infection. In cases of heavy infestation, a blood sample from the finger is mounted on a slide or placed in a counting chamber and examined for the presence and numbers of microfilariae. Light infections are ascertained by haemolysing or filtering a larger amount of blood (obtained through venipuncture) and trapping the microfilariae in the sediment or the membrane filter. Patients with clinical filariasis but without detectable microfilariae are tested for the presence of microfilariae antibodies. This paper reviews the methods currently in use, points out their advantages and disadvantages, and calls attention to some of the newer developments in diagnostic technique. (HC-L)

- 3721 **Aceves Sainos, D.** *Control de las enfermedades no transmisibles en el nivel primario de la atencion a la salud. (Control of noncommunicable diseases at the primary level).* Salud Publica de Mexico (Mexico City), 19(2), Mar-Apr 1977, 189-197. Span.

In Mexico, noncommunicable diseases account for approximately 44% of all deaths among adults aged 45-60 years, while communicable disease accounts for only 15%. Since many noncommunicable diseases can be prevented (cirrhosis of the liver, bronchitis, etc.) or treated, it is suggested that the information for prevention, instruments for detection, and protocols for referral and follow-up be introduced into the repertoire of auxiliaries and other community health workers at the primary level. (HC-L)

- 3722 **Ampofo, D.A.** *Changing pattern of midwifery practice in Ghana.* Ghana Nurse (Accra), 7(1), Jul 1977, 23-25. Engl.

Changing social and economic conditions in Ghana have had an effect on traditional concepts of family size and reproduction. Some of the traditional rites and beliefs related to reproduction are examined. The history of maternal child health services since the early 1900s is briefly outlined and the role of the midwife described. Recently, education of women, economic development, and urbanization have led to increased acceptance of smaller families. Improved health care, a

national family planning programme, and better training for midwives are other recent improvements in maternal child health in Ghana. (FM)

- 3723 Amsyari, F., Katamsi, E.** *Status of health knowledge and patterns of seeking health advice in rural East Java.* International Journal of Health Education (Geneva), 21(1), Jan-Mar 1978, 34-40. Engl.

Health knowledge and patterns of seeking advice were studied in the rural province of East Java, Indonesia, as the basis for the development of a comprehensive health education programme. Results of a questionnaire administered to all health personnel, key persons, and heads of households in 20 villages indicated that health personnel have a satisfactory level of health knowledge, that key persons have a higher level of health knowledge than family heads, and that health workers are consulted only in cases of illness, while key individuals (village administrators, indigenous midwives, etc.) are consulted regarding other health problems. Key persons in the villages will therefore be made the target of the proposed programme. (HC-L)

- 3724 Bandek, E.M. de** *Principales riesgos que afectan el crecimiento y el desarrollo integral del niño salvadoreño. (Principal risks affecting child growth and development in El Salvador).* Revista Centroamericana de Ciencias de la Salud (San Jose), 3(7), May-Aug 1977, 157-170. Span. 12 refs.

This paper presents a profile of San Salvador; salient characteristics are: a youthful population (46% of whom are aged less than 15 years); an infant mortality rate of 54:1 000; an illiteracy rate of 48.5%; a precarious economy, dependent on fluctuating world markets; a preponderance of preventable disease and malnutrition; and a dearth of medical facilities (e.g., 1 pediatrician:30 000 children) and public health services. Numerous data support the conclusion that the health situation in El Salvador is "unsatisfactory from any point of view." (HC-L)

- 3725 Basabe Fiallo, V.** Ecuador, Ministerio de Salud Publica. *Estudio de la provincia de Manabi. (Study of the province of Manabi).* Quito, Ministerio de Salud Publica, Departamento Nacional de Poblacion, Unidad de Evaluacion, Mar 1974. 32p. Span.

The following data on the rural province of Manabi, Ecuador, are set forward: geographic conditions; administrative divisions; population; demographic and socioeconomic characteristics; mortality, mortality by cause, and infant mortality; estimated access to prenatal, intranatal, and postnatal care; and available services in terms of numbers of medical establishments, populations served, types of services offered, person-hours worked, and consultations performed. Twenty tables of statistics are included. (HC-L)

- 3726 Basta, S.S.** *Nutrition and health in low income urban areas of the Third World.* Ecology of Food and Nutrition (London), 6(2), 1977, 113-124. Engl. 18 refs.

Data are presented illustrating the profound differences that exist in health and nutrition status between different income groups in cities of the developing world. Differences from one city to another seem to be greater than urban to rural differences. Adequate services, data collection, and programme planning are hampered by decision-makers' inability to recognize squatters as official city residents entitled to municipal services. Dependence on wage income, the instability of employment, and high residential densities make the urban squatter vulnerable to disease and malnutrition. (Modified journal abstract.)

- 3727 Behm Rosas, H.** *Mortalidad en los primeros años de vida en los países de la América Central. (Mortality in the first years of life in Central American countries).* Revista Centroamericana de Ciencias de la Salud (San Jose), 3(7), May-Aug 1977, 129-138. Span.

Census data from five Central American countries were analyzed to ascertain mortality rates for children aged less than 2 years (expressed as the probable number of deaths:1 000 live births) and the correlation between mother's level of education and under-five mortality. Overall under-two mortality rates for Costa Rica, Honduras, El Salvador, Nicaragua, and Guatemala were 81, 138, 145, 149, and 149, respectively. However, while under-two mortality rates for mothers with 10 or more years of education ranged from 30-48, those for mothers with no education ranged from 125-169. It is concluded that mortality in the 1st years of life remains a serious problem in Central America and that there is a strong inverse correlation between the mother's level of education and early childhood death. (HC-L)

- 3728 Ben Sira, Z.** *Involvement with a disease and health-promoting behavior.* Social Science and Medicine (Oxford, UK), 11(3), Feb 1977, 165-173. Engl. 29 refs.

A theoretical framework regarding the association between attitude toward a disease and preventive behaviour is proposed. A study carried out among a representative sample of 605 Jewish Israeli urban housewives showed that preventive behaviour may be predicted from attitudes toward a disease to the extent to which data are available showing the motivational aspects of the attitudes and the behaviour is regarded as relevant to the prevention of the disease. Further study is required, but the survey is seen as an important step in understanding the interrelationship between attitude and behaviour. (Modified journal abstract.)

- 3729 Bradley, A.K., Gilles, H.M., Shehu, U.** *Malum-fashi Endemic Diseases Research Project I; some ecological and demographic considerations.* Annals of Tropical Medicine and Parasitology (Liverpool, UK), 71(4), 1977, 443-449. Engl.

Background material for the endemic diseases research project in the Malumfashi area of Nigeria is presented. A knowledge of ecological features such as landforms, drainage, climate, soil structure, vegetation, and crop production contribute to the understanding of the epidemiology of the diseases studied: schistosomiasis, malaria, and meningitis. The three main ethnic groups of the area are described and the importance of demography to the medical studies is emphasized. Methods of enumeration, registration, and mapping, as well as the recruitment and training of local enumerators, complete this introductory paper and demonstrate how the project obtains basic data. (FM).

- 3730 Brown, C.L.** *Housing and health education.* Health Education Journal (London), 35(2), 1976, 167-174. Engl. 27 refs.

Although there is a clear correlation between poor housing and poor health, there are many factors to be considered in assessing housing and it is difficult to determine how far poor housing conditions might be a direct cause of poor health and how far health education might improve levels of health. WHO has proposed six criteria for healthful housing: shelter; provision for cooking, eating, washing, and excretion; inhibition of the spread of communicable disease; protection from noise and pollution; freedom from unsafe physical arrangements; and encouragement of personal and community development for the promotion of mental health. (DP-E)

- 3731 Browne, S.G.** *Rural health and disease in five continents.* Proceedings of the Royal Society of London (London), 199(1134), 19 Oct 1977, 9-15. Engl.

Royal Society Discussion of Technologies for Rural Health, London, UK, 9-10 Dec 1976.

Three-quarters of the population of Asia, Africa, and South America live in rural areas. They are generally poor, illiterate, and in poor health. Further disadvantages are that their country's medical resources are concentrated in urban centres, they are beset by exotic diseases, water supplies are often inadequate, tropical rains constantly threaten the topsoil, and their populations continue to grow at an alarming rate. Radical measures are needed to alleviate this situation. Health education, including family planning, and the widespread deployment of multidisciplinary teams are necessary to attack these serious problems. (DP-E)

- 3732 Bruce-Chwatt, L.J.** *Movements of populations in relation to communicable disease in Africa.* In Messing, S.D., ed., *Rural Health in Africa*, East Lansing, Mich., Michigan State University, African Studies Centre, *Rural Africana: Current Research in the Social Sciences*, No.17, Winter 1972, 39-48. Engl. 20 refs.

For complete document see entry 3029 (volume 5).

Population movements in Africa, past and present, are influenced by such factors as the slave trade, epidemics, tribal warfare, water supplies, work opportunities, resettlement schemes, urbanization, and political and social upheaval. These movements cause health problems and spread yellow fever, plague, typhus, sleeping sickness, and other diseases. The author suggests that an understanding of the relationship between these phenomena would be a valuable asset in the battle against disease on the continent. (DP-E)

- 3733 Butt, H.W.** *Nutrition programmes for children; towards an integrated approach.* Social Action (New Delhi), 26(2), Apr-Jun 1976, 157-170. Engl.

After pointing out some of the weaknesses of present programmes for children in India, the author describes a multidisciplinary project in Andhra Pradesh, where malnutrition is treated by a protein supplement, Hyderabad Mix, made of local ingredients. Mothers are also taught the basics of child care and feeding in an attempt to reduce infant mortality. Care of preschool children is centred around the *balwadi*, where trained nurse-midwives serve a nutritious midday meal and encourage parental education and participation. In other facets of the programme, local cultivation of papaya and drumstick trees has been encouraged, loans advanced to improve dairy herds, and poultry units established. Thus, the economic status of the farmer is improved as well as the general welfare of the community and the children's nutritional status. (FM)

- 3734 Calis San Felix, V., Aldes Pujol, A., Leiva Leiva, M.** Chile, Ministerio de Salud Publica, Programa de Extension de Servicios de Salud Materno Infantil y Bienestar Familiar (PESMIB). *Conocimiento, actitud y practica en relacion con el embarazo, parto, puerperio y cuidados del nino 25 areas PESMIB, 1974.* (Knowledge, attitudes, and practices regarding pregnancy, delivery, puerperium, and care of the child in 25 PESMIB areas, 1974). Santiago, Ministerio de Salud Publica, Unidad de Investigacion y Evaluacion, Jun 1976. 59p. Span.

See also entries 3734, 4035, and 4068.

A questionnaire was administered to 5 170 women in Chile's 25 maternal child health zones to determine their reproductive knowledge, attitudes, and practices. Their responses revealed that few of the women were aware of the symptoms of a complicated pregnancy, over 60% were aware of the risks involved in induced abortion, over 85% were aware of the diseases responsible for most infant mortality, only a third had an adequate understanding of infectious diseases, almost 95% preferred institutional to home delivery, 76% had received antenatal care during their last pregnancy, and over 40% had received postnatal care and care for the newborn following their last pregnancy. This document sets forward in 68 tables and discusses the findings of the study and their implications. (HC-L)

- 3735 **Canedo, L.** *Rural health care in Mexico?* Science (Washington, D.C.), 185, 27 Sep 1974, 1131-1137. Engl. 28 refs.

Mexico's health care structure has, to date, focused on the urban population; the few existing programmes aimed at rural communities have suffered from inefficiency, duplication of effort, and lack of coordination. In order to remedy this situation, a national information system consisting of a data bank for geographic, demographic, economic, social, ecological, and medical information and software developed for the purpose of relating health problems to their possible causes and potential responsible institutions has been set up at the *Universidad Nacional Autonoma* of Mexico. This paper describes the operation, sources of data, and potential uses of the information system plus an experimental training programme in community medicine that it generated. (HC-L)

- 3736 **Castellanos, R.A.** *Orientacao sobre saude bucal em um centro de saude. (Dental health education in a health centre).* Revista de Saude Publica (Sao Paulo, Brazil), 11(2), Jun 1977, 248-257. Portuguese.

During a 2-week period, 25 1st-time attenders at a Brazilian health centre were observed and filled out questionnaires to determine whether or not they were receiving adequate instruction in oral hygiene. Since the author was not satisfied with the results, he recommends a dental health education programme stressing care of the teeth, periodic visits to the dentist, preventive dentistry, sound nutrition, and basic instruction in anatomy and physiology. The programme's objectives, methodology, and content are outlined in an appendix. (RMB)

- 3737 **Colimon S., K.M.** *Estudios epidemiologicos experimentales o de intervencion. (Studies of epidemiological experimentation or intervention).* Revista de la Escuela Nacional de Salud Publica (Medellin, Colombia), 1(1), Aug 1974, 47-58. Span. 12 refs.

Epidemiological experimentation is a methodological procedure whereby the impact of a health intervention is assessed through comparison of a group experiencing the intervention (experimental population) with a group not experiencing the intervention (control population). The procedure has many uses, including the following: conducting clinical trials of new drugs or treatment, testing hypotheses of prevention or cure, evaluating programmes and treatment, and determining the cost-benefit of a certain course of action. This paper, written by a professor of epidemiology, introduces the reader to the methodology of epidemiological experimentation and its application in the field of public health. (HC-L)

- 3738 **Colombia, Departamento Nacional de Planeacion.** *Plan Nacional de Alimentacion y Nutricion; seleccion de alimentos. (National Food and Nutrition Plan; selection of foods).* Bogota, Departamento Nacional de Planeacion,

Unidad de Desarrollo Social, Documento DNP-UDS-DPN-011, 18 Oct 1974. Iv.(various pagings). Span.

See also entries 3611, 3612, and 3614.

Because of the vast variety of foodstuffs available in Colombia, the national food and nutrition plan will concentrate on a limited number of foods, their prices, and their consumption patterns. The data collected in this paper should consequently be useful in determining agricultural policies. Separate chapters deal with national and regional consumption patterns and the ranking of foods according to various nutritional elements, an analysis of the cost of principal foodstuffs in seven cities from 1964-1974, similar analyses of the cost of calories and proteins per gram, and general considerations on the percentage of family income spent on food. Copious statistical data are included. (RMB)

- 3739 **Colombia, Ministerio de Educacion Nacional.**

Bases para un programa nacional de investigaciones en tecnologia de alimentos y nutricion; tercera version, julio de 1973. (Basis for a national research programme into food and nutrition technology; third version, July 1973). Bogota, Ministerio de Educacion Nacional, Comité Nacional de Investigacion en Tecnologia de Alimentos y Nutricion del Fondo Colombiano de Investigaciones Cientificas y Proyectos Especiales "Francisco Jose de Caldas" Colciencias — Informes y Referencias No.12, 1973. 75p. Span. 41 refs.

A national research programme concerning food and food technology has been initiated in Colombia with a view to finding a solution to the problem of malnutrition. The programme will take a multisectorial approach to the problem, focusing not only on the food processing industry but also on agricultural production, distribution and marketing systems, consumer education, and health services. This document describes the background, justification, objectives, and working methodology of the programme and restrictions within which it must operate; it also lists and briefly discusses a number of projects that have been given priority by the programme committee and sets down some recommendations for action in the above sectors. (HC-L)

- 3740 **Colombia, Ministerio de Salud Publica y Asistencia Social, Instituto Colombiano de Bienestar Familiar.** *Proyeccion. (Projection).* Bogota, Ministerio de Salud Publica y Asistencia Social, Instituto Colombiano de Bienestar Familiar. Span.

This bimonthly publication is intended for those with a professional or nonprofessional interest in the health and welfare of the Colombian family. A typical issue carries articles on a pilot project in day care centres for mothers working in the coffee harvest, the radio as a medium of health and nutrition education, the legal aspects of civil and Catholic marriages, and the Cuban health care system. Photographs and line drawings appear throughout. (HC-L)

- 3741 Connor, D.H.** *Current concepts in parasitology; onchocerciasis.* New England Journal of Medicine (Boston, Mass.), 298(7), 16 Feb 1978, 379-381. Engl.

Onchocerciasis aetiology and control have been neglected by Western medicine because the disease appears to be restricted to a few endemic river areas of the Third World. Recently, however, WHO, PAHO, IBRD, and other international organizations have begun to develop coordinated long-range programmes to promote the study and control of the disease. Some of the findings of these programmes are presented, including a description of the drugs and surgical techniques now used to treat infected patients, and a number of disease control programmes are evaluated. The author points out that any successful onchocerciasis control programme must combine reduction of the black fly population with patient care to reduce disease and the reservoir of parasites. (RMB)

- 3742 Coumbaras, A.** *Travaux hydrauliques et problemes de sante dans les pays en voie de developpement. (Health problems associated with water works in developing countries).* Acta Tropica (Basel, Switzerland), 34(3), Sep 1977, 229-248. Fren.

The harnessing of water for irrigation and energy needs in developing countries has had undesirable side effects in terms of disruption of lifestyles and the transmission of disease (malaria, onchocerciasis, schistosomiasis, and fecally-transmitted diseases). It is therefore suggested that each development project be monitored from planning to completion by a representative from the ministry of health and that provision for this individual and his recommendations be made within the project's budget. It is further pointed out that a well-maintained water system constitutes less of a health hazard than a poorly-maintained one and that the application of vector control to localized foci is more effective than attempts at wholesale vector eradication. (HC-L)

- 3743 Da Silva, E., Burgers, A., Olembro, R.** *Health and wealth from waste; an economic incentive for developing countries.* Impact of Science on Society (Paris), 26(4), Oct-Dec 1976, 323-332. Engl.

Proper management of wastes and wastewater can yield considerable dividends in health and economic terms: treating domestic and industrial wastewater by means of microbial activity destroys disease-producing organisms and produces a nutrient-rich algae that can be used for animal feed and fermenting sludge in a bio-gas plant converts it into nitrogen-, phosphorous-, and potassium-rich fertilizer and energy-producing methane gas. This paper describes the technology involved in both procedures and their advantages for a developing country. (HC-L)

- 3744 da Silveira Baldy, J.L., Landgraf, A., de Queiroz, A.C., Verenhitch, A., Verenhitch, H., Cattoni, A.M., de Magalhaes, E.V.** *Tetano e vacinao antitetanica; estudo na populacao urbana de Londrina (PR), Brasil. (Tetanus and antitetanus*

vaccination; a study of the urban population of Londrina (PR), Brazil). Revista de Saude Publica (Sao Paulo, Brazil), 10(2), Jun 1976, 151-166. Portuguese. 14 refs.

A questionnaire survey of 60 Brazilian housewives and 1 242 students revealed that they shared many incorrect concepts about tetanus, its control and transmission, and the use and effectiveness of tetanus antitoxin. The author discusses the implications of these findings for public health and recommends changes in tetanus immunization programmes. The responses to the questionnaire have been tabulated as statistical data. (RMB)

- 3745 Davies, B.T., Shahnawaz, H.** *Anthropometer for use in developing countries.* Ergonomics (London), 20(3), 1977, 317-320. Engl.

The design of a simple anthropometer, built in Iran, is described. It consists of: 1) a base, made of angle iron with a wood platform on which the subjects place their feet; 2) a seat, of wood in a metal frame, designed to move up and down a vertical column; 3) the verticle column, 215 cm in length, of hollow, galvanized steel; and 4) a calibrated articulated horizontal arm, counter-weighted to move up and down in a groove machined in the column. This provides for vertical and horizontal measurements. Details are shown in line drawings, while the complete apparatus is shown in a photograph. Weighing 25 kg, it is easily dismantled for transport. Repeated checking proved the anthropometer accurate to within 0.5 cm. (Modified journal abstract.)

- 3746 de Guevara C., L.L.** *Honduras, Patronato Nacional de la Infancia. Condiciones bio-psico sociales del nino de 0-15 anos en Honduras; esquema de un diseno de investigacion. (Biological, psychological, and social conditions of the 0-15-year-old child in Honduras; scheme for the design of a research project).* Tegucigalpa, Patronato Nacional de la Infancia, Estudio del Nino, Nov 1974. 1v.(various pagings). Span. Congreso Centroamericano de Pediatria, Panama City, Panama, 2-7 Dec 1974.

The author presents a plan for a multidisciplinary national research project designed to evaluate the health status of children aged 0-15 years in Honduras and make suggestions for its improvement. The children's physical and mental health, nutrition status, and socioeconomic and demographic characteristics will be examined. The data collected will also be used for special studies on factors influencing abandonment of children, child care institutions, school attendance, child labour, utilization of health services, migration, etc. The project methodology is described in detail and annexes contain the forms and questionnaires that will be used in the survey. (RMB)

- 3747 Devadas, R.P., Murthy, N.K.** *Nutrition of the preschool child in India.* World Review of Nutrition and Dietetics (London), 27, 1977, 1-33. Engl. 61 refs.

This extensive review of the nutritional strategy of Indian preschool children consists mainly of summaries of recent research into the incidence and prevention of malnutrition. The various topics covered include: the ability of breast milk alone to meet the demands of infant growth and development; the nutritional requirements of nursing mothers, infants, and preschoolers; growth studies carried out in India; prevalence and cost of preschool malnutrition in India; morbidity due to malnutrition; the role of simple technology (i.e., the identification and development of low-cost, indigenous, nutrient-rich foods) in alleviating malnutrition; feeding trials with various weaning mixtures; nitrogen retention in children receiving vegetable protein supplements; and seven feeding programmes currently in operation throughout India. Twenty-five tables of data are included. It is suggested that preschool feeding programmes have a dual function, i.e., to improve the nutritional status of the children and to motivate their elders towards desirable changes in food behaviour, and that, to accomplish this, such programmes should be comprehensive, use locally-available foods, involve the local population, and be integrated with other health services. (HC-L)

- 3748 Dios Rosales, J. de** *Suplemento a la II parte del informe final: monografía sobre el desarrollo del programa de salud rural en Guatemala; III part del informe final, anexo "C". (Supplement to part II of the final report: monograph on the development of the Guatemalan rural health programme; part III of the final report, annex "C").* Guatemala City, Academia de Ciencias Medicas, Fisicas y Naturales, n.d. lv.(various pagings). Span.
Seminario sobre el Desarrollo de una Metodología para el Adiestramiento de Auxiliares en Salud, Guatemala City, Guatemala, 16-23 May 1976.

See also entries 3938, 3939, and 3940.

As background to the development of a rural health programme for Guatemala, an investigation of environmental and health conditions in 15 villages was undertaken. The villages were selected by ethnic populations: 6 with a Spanish-speaking majority, 6 with an indigenous majority, and 3 intermediate. A questionnaire soliciting information on housing, food, clothing, education, religious beliefs, immunization status, sanitation facilities, ability and/or willingness to pay for health services, etc., was administered to 15 persons from each village. This document sets forward and discusses the responses to the questionnaire, which is appended. (HC-L)

- 3749 Eddy, T.P.** *Error of medicine? Kwashiorkor and the "protein gap."* Tropical Doctor (London), 7(1), Jan 1977, 28-32. Engl. 9 refs.

The validity of the belief that protein deficiency is the sole cause of kwashiorkor is questioned. It is felt that the protein crisis emphasizes one factor only in the diet and neglects the importance of a low energy intake caused

by an inadequate quantity of food. The total food supply, not just protein, must be taken into account. The treatment and prevention of kwashiorkor and protein-energy malnutrition are discussed, with emphasis on an adequate protein-energy ratio, inclusion of minerals and vitamins, use of ordinary foods rather than expensive "hospital" ones, and general improvement in the quality of life of the community. (Modified journal abstract.)

- 3750 Effiong, C.E., Dawodu, A.H.** *Neonatal morbidity and mortality in a special care baby unit in Nigeria; preliminary report of a prospective study.* East African Journal of Medical Research (Nairobi), 4(1), Jan 1977, 25-29. Engl. 15 refs.

Preliminary data on morbidity and mortality in low-birth-weight (LBW) Nigerian neonates have shown striking differences compared with European and North American data. Mortality in infants weighing 2 kg or less was much lower than in Caucasian counterparts. When mortality was related to gestational age, however, there was no difference. About 60% of these infants were small for their gestational ages. These results suggest that the comparatively low mortality in Nigerian LBW infants might be due to the high proportion of relatively mature infants among them. (Modified journal abstract.)

- 3751 Elling, R.H.** *Industrialization and occupational health in underdeveloped countries.* International Journal of Health Services (Westport, Conn.), 7(2), 1977, 209-235. Engl.

In addition to poverty-related health problems, industrial workers in developing countries face many occupational hazards, especially where protective laws and health programmes and personnel are minimal. Suggestions that working conditions be regulated and medical care be improved overlook the political-economic relations between developing and developed nations, which encourage the exploitation of the former's cheap labour, natural resources, etc. The author feels that the best solution is for the workers themselves to realize that they are being exploited and to try to build the kind of economic system and society that will enhance, not simply exploit, human potential. (DP-E)

- 3752 Ferro Vargas, C.** *Paludismo, problema de salud publica en Colombia. (Malaria, a public health problem in Colombia).* Revista de la Escuela Nacional de Salud Publica (Medellin, Colombia), 1(1), Aug 1974, 41-45. Span. 14 refs.

Today in Colombia, malaria ranks 40th as a cause of morbidity, ranks 10th as a cause of mortality, and infects 2.6:1 000 individuals annually. Current efforts to control the disease in endemic areas consist of spraying homes with DDT and treating infected persons with antimalarial drugs. To be effective, however, these measures must be assiduously applied by a community convinced of their value. This paper reviews the present status of malaria control in Colombia, the geographic distribution of remaining pockets of endemicity, and the implications of the aforementioned human element in the anti-malaria effort. (HC-L)

- 3753 Florez, A.** *Desarrollo de un programa de estimulación infantil para niños a riesgo de desnutrición en barrios marginados de Bogotá. (Development of a mentally-stimulating programme for children at-risk from malnutrition in marginal barrios of Bogotá).* Bogotá, Ministerio de Salud Pública y Asistencia Social, Instituto Colombiano de Bienestar Familiar, n.d. 8p. Span. Reunion Anual de la Asociación Americana de Antropología, Simposio sobre Desnutrición, Estimulación Infantil, y el Estudio Antropológico de la Educación, Mexico City, Mexico, 18-24 Nov 1974.

Unpublished document.

As part of a longitudinal enquiry into the relative effect of nutrition and stimulation on intellectual development, a methodology for introducing stimulating child-rearing practices into disadvantaged homes was developed and tested in Bogotá, Colombia. The methodology involved sending specially-trained young women into the homes to teach mothers techniques of encouraging their infants to develop cognitive, psychomotor, and language skills. This paper describes the pilot trial of the methodology plus some of the conditions and child-rearing practices encountered in the homes. It is hoped that the results of the trial will be useful in designing a programme for the prevention of mental retardation. (HC-L)

- 3754 Frelick, R.W.** *Volunteer in Afghanistan.* Delaware Medical Journal (Wilmington, Del.), 49(12), Dec 1977, 691-696. Engl.

The author relates his impressions of the health situation in Afghanistan after a month-long stint as a volunteer with CARE-MEDICO. Among other health problems, he notes open sewers, an unsafe water supply, poor plumbing, and a high prevalence of disease. He discusses the CARE-MEDICO project at the Jumhariat Hospital and describes the hospital's personnel, facilities, and routine. The training and use of physicians is touched upon and their low government salaries mentioned. Drugs and the methods of supplying them and some of the more common medical problems are considered. The author concludes with some ideas on how to improve health in Afghanistan. (DP-E)

- 3755 Greaves, J.P.** *Feeding programmes at village level.* Indian Journal of Nutrition and Dietetics (Coimbatore, India), 14(11), Nov 1977, 325-333. Engl.

This paper discusses four different types of feeding programmes (supplementary, applied nutrition, nutrition rehabilitation, and emergency relief) and a number of issues related to feeding and nutrition programmes in general. Foremost among these are the questions of selecting the beneficiaries of feeding programmes and of community involvement in the planning and implementation of feeding and nutrition education programmes. It is suggested that feeding programmes are of limited

value unless accompanied by treatment of common ailments, preventive medicine, improvements in environmental health, and health education and that the linking of such programmes to agricultural production is desirable. Examples are taken from India. (HC-L)

- 3756 Gulati, P.V., Singh, K.P., Braganza, C.** *Role of sociocultural and environmental factors in the cause of scabies.* International Journal of Dermatology (Philadelphia, Pa.), 16(4), May 1974, 281-283. Engl.

A house-to-house scabies survey of 1 727 individuals from 273 urban Indian families revealed that sleeping habits, overcrowding of sleeping spaces, and sharing clothes, towels, etc., were significantly associated with scabies. There was no significant correlation between the size of the family and the number of infected members or between the incidence of the disease and standards of hygiene. Since most people surveyed were unaware of the mode of transmission of scabies, the authors recommend that more emphasis be given to health education and preventive measures. (RMB)

- 3757 Gurney, J.M.** *Problems of feeding the weaning age group; an overview of available solutions.* Cajanus (Kingston, Jamaica), 12(1), 1979, 43-51. Engl. 10 refs.

Weaning age children often receive inadequate food because of a lack of resources (poverty, availability at food outlets, etc.), knowledge (what types of foods are needed, how to prepare them), and facilities to prepare and store such foods. Education of the media and of mothers in particular is necessary to correct this situation. Ideal weaning foods should provide energy and proportionate nutrients and be digestible, reasonably germ-free, easily prepared, administered frequently, and within the budget of low-income families. Methods of improving food quantity and quality include cultivating backyard gardens, producing food within the country, processing available foods in the home or at village or community level, developing home-made weaning foods, marketing food at prices affordable by poor urban and rural families, etc. (AF)

- 3758 Hinman, A.R.** *Pan American Health Organization, Washington, D.C. Analysis, interpretation, use, and dissemination of surveillance information.* Bulletin of the Pan American Health Organization (Washington, D.C.), 11(4), 1977, 338-343. Engl.

Surveillance data lay the groundwork for effective large-scale health programmes. Sometimes, however, it is difficult to obtain surveillance data, to determine the reliability of collected data, or to ensure that the data will be used to maximum advantage. This article provides a basic review of these three problems and ways to approach them, drawing illustrative examples from various sources, including the author's own experience. (Modified journal abstract.)

- 3759 Hiramani, A.B., Srivastava, U.** India, Directorate General of Health Services, Central Health Education Bureau. *Review of behavioural studies in the causes of drug default and irregularity in the treatment of tuberculosis*. New Delhi, Directorate General of Health Services, Central Health Education Bureau, n.d. 8p. Engl. 10 refs.

Unpublished document; appended to Research Findings, (New Delhi), 9(3-4), Oct 1976-Jan 1977; see also entries 3845 and 4027.

Ten investigations into the causes of drug default and treatment irregularity among tuberculosis patients conducted in India from 1964-1973 are summarized. The results suggest that the major causes of drug default are the achievement of symptomatic relief, economic difficulties, an unsympathetic attitude on the part of clinic staff, distance from the clinic, unsuitable clinic hours, change of residence, lack of motivation, dissatisfaction with treatment, belief that the disease is cured, domestic preoccupations, drug toxicity, and organizational problems. The findings also indicate that many cases can be salvaged by means of concerted follow-up on the part of senior clinic staff and health visitors. Suggestions for reducing the number of defaulters are included. (HC-L)

- 3760 Hirshman, J.H.** *Communicable disease in the South Pacific Islands, I*. Medical Journal of Australia (Sydney), 2(19), 12 Nov 1976, 758-760. Engl.

The epidemiology and distribution of communicable diseases in the South Pacific Islands is discussed in the context of the importation risks they pose to surrounding countries. Medical checks of migrant workers and diagnostic procedures are inadequate. Vigilant surveillance must be maintained to prevent and control possible outbreaks of malaria, typhoid, tuberculosis, and dengue, the major problems at the present. Thirty parasitic, viral, and other infectious diseases are listed along with their distribution in various parts of the South Pacific. Suggestions are given for improving diagnostic methods. (FM)

- 3761 Howard, J., Lloyd, B.** *Oxfam sanitation unit*. Proceedings of the Royal Society of London (London), 199(1134), 19 Oct 1977, 179-182. Engl. Royal Society Discussion of Technologies for Rural Health, London, UK, 9-10 Dec 1976.

The problem of dealing with human excreta in refugee camps during the Bangladesh war stimulated the invention of a primitive septic tank system. From this, the patented Oxfam sanitation unit, described in detail in this article, was developed. Easily installed and maintained and using no power source, the unit provides sanitation facilities for 500 people at a cost of £ 2 500 and can greatly reduce the incidence of cholera, parasites, and other intestinal diseases. The authors recommend its use in urban slums and rural areas. (DP-E)

- 3762 Instituto de Nutricion de Centroamerica y Panama, Division de Ciencias Agricolas y de Alimentos, Guatemala.** *Aplicacion de la tecnologia de*

alimentos y nutricion animal al mejoramiento de la dieta en los paises en desarrollo. (Application of food technology and animal nutrition to dietary improvement in developing countries). Boletín de la Oficina Sanitaria Panamericana (Washington, D.C.), 78(1), Jan 1975, 8-29. Span. 120 refs.

The Latin American diet based on cereals and legumes is generally deficient in essential amino acids, vitamins, and minerals. It could be improved, without drastic changes in eating habits, by simultaneously raising the quantity and quality of the cereals and the legumes currently consumed and by making the deficient nutrients available in the form of relatively small quantities of protein supplements or animal products. Efforts to do so, however, have met with obstacles in the agricultural and food production industries. These obstacles are discussed and it is concluded that improvement in the nutrition status of the Latin American population will take time to accomplish. (HC-L)

- 3763 Isely, R.B.** *Survey of student health interests in South Central Cameroon*. International Journal of Health Education (Geneva), 21(1), Jan-Mar 1978, 41-45. Engl.

As an aid to developing a school health programme, directors of 16 schools in Cameroon collected health-related questions from all 5th- and 6th-year students. Analysis of the questions revealed that 34% dealt with the leading national health problems and that they resembled questions asked by schoolchildren in other countries (Uganda, Lebanon, and England). These findings indicate that the health interests of schoolchildren are reliable indicators of health needs and reveal a universal interest in common diseases, anatomy and physiology, sex, nutrition, personal and environmental hygiene, hospital and clinic procedures, etc. (HC-L)

- 3764 James, W.P.** *Kwashiorkor and marasmus; old concepts and new developments*. Royal Society of Medicine Proceedings (London), 70(9), 1977, 611-615. Engl. 36 refs.

Clinical investigation is gradually revealing that the aetiology of kwashiorkor and marasmus is more complex than was at first suspected. This paper discusses recent research findings relative to: individual variability in adapting to deficient diets; the importance of energy (calorie) intakes in adapting to deficient diets; the role of essential fatty acid, iron, and folic acid deficiencies in protein-calorie malnutrition; and the significance of abnormal gut mucosa in the kwashiorkor and/or marasmic child. (HC-L)

- 3765 Janik, D.S., Sarner, O.W., Buerger, E., Newbold, J.L., Scriven, S.B., Henriksen, K.** *Computerized patient data recording and reporting: effect on community health activities*. Loma Linda, Cal., Loma Linda University Medical Centre, May 1978. 3p. Engl.

Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public

Health Associations, Halifax, Canada, 23-26 May 1976.

Unpublished document.

The Loma Linda University Medical Center (California, USA) has developed a method of using computers to document care received by newborn infants in their intensive care unit and rapidly communicate this information to referring physicians and agencies. The methods and materials employed are described at some length. This system allows for more accurate diagnosis and dramatically reduces the time spent by physicians and nurses on paperwork. Copies of the data entry form, visual screens, and computer generated letters are available on request; the computer program can be purchased for US\$50.00. (DP-E)

- 3766 Jelliffe, D.B., Jelliffe, E.F.** *Feeding young infants in developing countries; comments on the current situation and future needs.* Studies in Family Planning (New York), 9(8), Aug 1978, 227-229. Engl.

In developing countries, marasmus and diarrhea have become major causes of death and disease in infancy as a result of increased bottle feeding in areas of poverty, poor home hygiene, and low levels of parental education. Expertise in food technology is needed for production of: low-cost formulas (for use when mother dead, baby abandoned, etc.); economical, nutritious weaning food mixtures based on local resources, customs, and needs; low-cost maternal dietary supplements for pregnant and lactating women; more appropriately educated health professionals; and consciousness-raising policymakers who encourage sound infant nutrition and breast-feeding. (AF)

- 3767 Jelliffe, D.B.** *World trends in infant feeding.* American Journal of Clinical Nutrition (Bethesda, Md.), 29(11), Nov 1976, 1227-1237. Engl. 46 refs.

While many mothers in the developing countries are abandoning the breast for commercial baby foods, mothers in the developed countries are returning to breast-feeding in increasing numbers. This paper discusses why mothers' milk is preferable to any substitute, emphasizing: the nutritious and anti-infective properties; the anti-allergic, contraceptive, emotional, and economic advantages of breast-feeding; and the particular dangers associated with bottle-feeding under economically-disadvantaged and unhygienic conditions. (HC-L)

- 3768 Khandekar, M.** *Research design for the domiciliary child nutrition project at Palghar.* NHA Bulletin (New Delhi), 10(2), 1977, 101-117. Engl.

The research design of a project in Palghar, India, is set forth. The project's immediate objective was to devise ways of integrating the health and nutrition services for preschool children. When the project was initiated in 1972, it covered 20 villages with a total population of 20 000. To provide background data, 421 households were interviewed in 1972 and 471 in 1974. Special

studies, with control villages, were designed to evaluate the influence of treatment for worm infection and the effect of an improved tap water supply and nutritional supplements on nutritional status. Further reports on the project are promised. (DP-E)

- 3769 Kloppers, P.J., Fehrsen, G.S.** *Western diseases in developing peoples; in search of a 'marker.'* South African Medical Journal (Capetown), 51(21), 21 May 1977, 745-746. Engl. 16 refs.

A phlebolith is the end product of thrombosis in a vein. They are seldom seen in radiographs of tribal people living according to the traditional ways in South Africa. They are as common in whites in South Africa as they are in other countries with a Western lifestyle and could be important early manifestations, or "markers," warning of an imminent Western pattern of diseases. (DP-E)

- 3770 Lechat, M.F., Misson, C.B., Bouckaert, A., Vellut, C.** *Epidemiometric model of leprosy; a computer simulation of various control methods with increasing coverage.* International Journal of Leprosy (Washington, D.C.), 45(1), 1977, 1-8. Engl.

An epidemiometric model of leprosy has been developed to predict and simulate trends of leprosy under various control conditions. The model is based on data collected in the Polambakkam leprosy control scheme in South India from 1954-1970. Various control methods were considered, the most effective being vaccination with a disease-specific vaccine 100% effective for controlling leprosy. A 90% incidence reduction is achieved at approximately 8 years with 100% coverage, 10.5 years with 90% coverage, and 18 years with 80% coverage. This clearly stresses research in the development of a vaccine as the highest priority for leprosy control. (DP-E)

- 3771 Lechtig, A., Arroyave, G.** Pan American Health Organization, Washington, D.C. *Nutrition problem in Latin America; definition, causes, and remedial actions.* Bulletin of the Pan American Health Organization (Washington, D.C.), 11(4), 1977, 319-331. Engl. 38 refs.

Poverty-related malnutrition in Latin America, especially among mothers and children, calls for major economic and social adjustments, but present development programmes are too gradual and place too little emphasis on nutrition. Instead, the health sector must promote and implement nutrition programmes as an integral part of primary health services and community development programmes. The problem must be studied further so that recommendations can be made on nutritional requirements to help guide policies on food acquisition and availability. Statistical data are included. (DP-E)

- 3772 Mak, J.W., Rajagopal, V., Cheong, W.H., Si-
vanandam, S., Mahadevan, S.** *Filariasis survey of the youth training centre in Dusan Tua, Selangor, peninsular Malaysia.* Medical Journal of

Malaysia (Singapore), 31(2), Dec 1976, 153-157. Engl.

From 1973-1974, night blood films were examined from 1 733 recruits at a youth training centre near Kuala Lumpur, Malaysia, and 63 (3.6%) were found to contain microfilariae of *Brugia malayi*. The mean density was 41 microfilariae:60 mm. Seventeen of 1 079 recruits without microfilariae and 1 of 48 with microfilariae gave histories of intermittent fever suggestive of filariasis, although there were no overt lesions on the genitals. It is recommended that all new recruits should be examined for microfilariae and that those found to be positive should be treated to avoid carrying the disease to non-endemic areas. (Modified journal abstract.)

- 3773 Mburu, F.M., Smith, M.C., Sharpe, T.R.** *Determinants of health services utilization in a rural community in Kenya*. Social Science and Medicine (Oxford, UK), 12(4A), Jul 1978, 211-217. Engl. 17 refs.

The principal objective of this paper is to delineate social, structural, and health policy aspects related to the use of childhood vaccinations in an area of Machakos, Kenya. Children who have had BCG and smallpox vaccinations are likely to have received all other immunizations. The scars of BCG and smallpox vaccination were used to determine those children aged 0-4 years who had received preventive health care in the community. A multivariate analysis revealed the health behaviour related components: demographic structure, cosmopolitanism, health consciousness, attitudes toward health care, awareness of modern health services, and the presence of significant references. It is concluded that, although the individual characteristics are important in the maintenance of health behaviour and the use of preventive health services, the social structure and the health policy are far more important determinants of community health care. (Journal abstract.)

- 3774 Minkler, M.** *"Thinking the unthinkable": the prospect of compulsory sterilization in India*. International Journal of Health Services (Westport, Conn.), 7(2), 1977, 237-248. Engl. 31 refs.
- India's efforts to reduce its rapid population growth include a movement towards compulsory sterilization. Faced with the apparent failure of its family planning programme, begun in the 1950s, the government's new policy recommends the compulsory sterilization of couples with three or more children and preferential treatment of those who voluntarily accept sterilization. Some states have already enacted such legislation and rumours abound of mass sterilizations. At the same time, penalties for those exceeding the two or three child limit are widespread and include the withdrawal of the nutrition supplement, refusal to deliver a 4th child, and denial of reimbursement of medical expenses. The social, ethical, and administrative implications of these programmes are discussed. (FM)

- 3775 Mora, J.O., Clement, J., Forez, A., Suessun, J.** *Desnutrición, desarrollo intelectual y antropología de la educación*. (Malnutrition, intellectual

development, and the anthropology of education). Bogota, Ministerio de Salud Publica y Asistencia Social, Instituto Colombiano de Bienestar Familiar, 1974. 9p. Span. 37 refs.

Reunion Anual de la Asociacion Americana de Antropologia, Simposio sobre Desnutricion, Estimulacion Infantil, y el Estudio Antropologico de la Educacion, Mexico City, Mexico, 18-24 Nov 1974.

Unpublished document.

There are a number of reasons for believing that the association between malnutrition and mental retardation is a causal one: consistent and persistent association of the two in different times, places, geographical areas, races, etc.; the clear relationship between the severity of the malnutrition and the severity of retardation; scientific knowledge of possible mechanisms through which malnutrition could influence mental development; and improvements in the degree of retardation brought about through nutrition rehabilitation. On the other hand, evidence exists to suggest that mental retardation is as much the result of the lack of psychological stimulation common in disadvantaged families as malnutrition. This paper discusses the difficulty of separating and proving these two hypotheses and the practical and scientific motivation for this research. (HC-L)

- 3776 Morgan, P.R.** *Pit latrine — revived*. Central African Journal of Medicine (Salisbury), 23(1), Jan 1977, 1-4. Engl.

A very old and cheap method of excreta disposal, the pit latrine, was objectionable because of offensive odours and fly breeding. These two problems have been solved by means of a black ventilation pipe fitted with a fly screen. The pipe connects with the pit and rises up the outside of the latrine superstructure. The draughts thus created carry the odours into the air, attracting flies away from the pit. The few flies that do breed in the pit and their offspring eventually die on the screen when they attempt to leave the pit by way of the pipe. (DP-E)

- 3777 Mousa, A.H.** *Mass chemotherapy campaigns for control of schistosomiasis in Egypt*. Egyptian Journal of Bilharziasis (Cairo), 3(1), 1976, 1-9. Engl. Refs.

Mass therapy campaigns against schistosomiasis in Egypt have been employed since 1920, but finding suitable drugs and reaching the entire population have been obstacles to their complete success. This article describes the various methods and materials tried in the attempt, largely unsuccessful, to solve the problems. Present and future campaigns are discussed as well. The author concludes by presenting some principles to be borne in mind in future efforts in this area. (DP-E)

- 3778 Muller, M.** *Cigarettes kill the poor and black, too*. New Scientist (London), 78(1106), 8 Jun 1978, 679-681. Engl.

The recent rapid increase in tobacco consumption in developing countries is accompanied by an increase in smoking-related diseases. Although still low in comparison with the Western world, the mortality from lung

cancer is rising steadily. In this article, the economic impact of the tobacco industry and the power of multinational tobacco companies are examined. Tobacco is relied upon as an important source of revenue, often to the detriment of more valuable food production. In many cases, agricultural land is being diverted from food crops to tobacco. In addition, only 11 out of 45 developing countries have taken any regulatory action against smoking, compared with 19 out of 20 developed countries. (FM)

- 3779 **Noguer, A., Wernsdorfer, W., Kouznetsov, R.L., Hempel, J.** WHO, Division of Malaria and Other Parasitic Diseases, Malaria Unit, Geneva. *Malaria situation in 1976*. WHO Chronicle (Geneva), 32(1), Jan 1978, 9-17. Engl.

Also published in French, Russian, and Spanish.

This paper contains a region-by-region review of international malaria epidemiology and control. Despite recent setbacks due to the current world economic crisis, administrative and operational difficulties, and technical problems such as the resistance of malaria vectors to DDT, many developing countries are determined to embark on major antimalarial efforts. WHO is assisting by helping them to incorporate malaria control measures into basic health services, promoting coordination of malaria control programmes at the international level, facilitating the training of professional staff, and sponsoring research into the technical aspects of malaria control. (HC-L)

- 3780 **Notari Stange, M., Mardini Wazzir, M., Acuna Sepulveda, C.** Chile, Ministerio de Salud Publica, Programa de Extension de Servicios de Salud Materno Infantil y Bienestar Familiar (PESMIB). *Morbilidad percibida y uso de servicios materno infantiles 25 areas PESMIB, 1974*. (*Perceived illness and the utilization of maternal and child health facilities in 25 PESMIB areas, 1974*). Santiago, Ministerio de Salud Publica, Unidad de Investigacion y Evaluacion, Apr 1976. 43p. Span.

See also entries 3734, 4035, and 4068.

From May-August 1974, 5 170 women in the reproductive years from Chile's 25 maternal and child health zones were interviewed regarding what they perceived as illness, whether they or their children had recently been ill, and whom they consulted during the illness episode. Information regarding the sociodemographic characteristics of the women were also obtained. This document sets forward a number of hypotheses regarding the users of maternal and child health services, the results of the interviews (in 40 tables), and an analysis of those results. Results showed that 44.7% had been ill during the previous 2 weeks, 68.6% of those whose youngest child was aged less than 5 years were sick during the interview period, etc. (HC-L)

- 3781 **Ogunbi, O., Fadahunsi, H.O., Ahmed, I., Animashaun, A., Daniel, S.O., Onuoha, D.U., Ogunbi, L.Q.** *Epidemiological study of rheumatic fever and rheumatic heart disease in*

Lagos. Journal of Epidemiology and Community Health (London), 32(1), Mar 1978, 68-71. Engl. 17 refs.

Until recently, it was thought that streptococcal infections and their sequelae occurred rarely in tropical and subtropical countries and were not therefore a major health problem. This 1972 study of 12 755 schoolchildren in Lagos (Nigeria) supports the opposite view that rheumatic heart disease is today the commonest form of heart disease in children and young adults in developing countries and one of the most common cardiovascular diseases in adults, thus posing an ever increasing health problem. Poor environmental hygiene, low socioeconomic standards, and the lack of a comprehensive prophylactic programme against streptococcal infections are contributing to this increase. The results of this and other studies are cited in detail and statistical data are included. (RMB)

- 3782 **Pan American Health Organization, Washington, D.C.** *New approaches in American trypanosomiasis research; proceedings of an International Symposium, Bela Horizonte, Minas Gerais, Brazil, 18-21 March 1975*. Washington, D.C., Pan American Health Organization, Scientific Publication No.318, 1976. 410p. Engl. International Symposium on New Approaches in American Trypanosomiasis Research, Belo Horizonte, Brazil, 18-21 Mar 1975.

Formal presentation and background papers from this international symposium on trypanosomiasis research in Central and South America are reproduced under these headings: the vector; the parasite and host response; regional differences in the diagnosis and clinical aspects of the disease; chemotherapy, insecticides, and other approaches to treatment and control; various aspects of the epidemiology of the disease; and priorities in, neglected areas of, and new approaches to trypanosomiasis research. Summaries of these topics and the recommendations and conclusions of the symposium follow. (HC-L)

- 3783 **Pellett, P.L.** *Nutritional problems of the Arab world*. Ecology of Food and Nutrition (London), 5(4), 1976, 205-215. Engl. 33 refs.

Analysis of food consumption and diet patterns of the Arab world show that malnutrition in this area is related more to environmental, hygienic, and socioeconomic factors than to food quality. Although certain nutrient deficiencies do exist, the main problem is lack of food in general. Commercial and multinational activity in food supplements is criticized with emphasis on the need for increased local food production. Checking population growth is the 1st step that must be taken to alleviate malnutrition, followed by social, political, and educational reforms. Only then can specific nutrition programmes hope to have lasting effects. (FM)

- 3784 **Petros-Barvazian, A., Behar, M.** *Low birth weight — what should be done to deal with this global problem*. Cajanus (Kingston, Jamaica), 12(1), 1979, 6-9. Engl.

Recent studies of birth weights, which can often depend on the mother's size or height, age, parity, socioeconomic status, education, smoking habits, nutritional status, and morbidity, have shown that environmental influences during pregnancy can be an important indicator of health and development. Appropriate health care before conception and birth can help prevent low-birth-weight (LBW) babies in developing countries; therefore, prenatal care should concentrate on the practice of family planning and the prevention of malnutrition, morbidity, and infections during pregnancy to help reduce LBWs by influencing the mother's age at pregnancy, parity, and spacing between pregnancies. (AF)

- 3785 Rebolledo A., A., de Pujadas H., G.** *Algunas características de la alimentación de la población chilena; hábitos y conocimientos alimentarios de los chilenos. (Some characteristics of the eating habits of the Chilean population; nutrition knowledge and practices).* Revista Medica de Chile (Santiago), 104(6), Jun 1976, 391-395. Span. 10 refs.

This University of Chile medical school study aims to determine the nutrition knowledge and practices of adolescents in an urban, suburban, and rural area of Santiago. So far, 450 students (10% of the total sample) from the urban and suburban areas have been interviewed and differences in their eating habits have already become apparent. For example, students in the comparatively wealthy urban area consume greater quantities of milk and fruit and indicate a larger number of food preferences than do students from the poorer suburban area. It is hoped that this study will provide a basis for continuous research into the nutritional habits of the Chilean population. Findings from this and earlier studies are set forward in 14 tables. (HC-L)

- 3786 Renan Esquivel, J.** *Salud integral y medio ambiente vital. (Total health and a vital environment).* Panama City, Hospital del Nino, Jun 1976. 18p. Span.

This brochure discusses the nature of health, pointing out its relationship to factors in the physical environment and the social context. The need to break the cycle of malnutrition and underdevelopment that currently prevents rural Latin American populations from realizing their potential is stressed and the role of Panama's self-help groups (health committees) is briefly discussed. A list of the citizen's rights and duties *vis-a-vis* health is appended. (HC-L)

- 3787 Rowland, M.G., McCollum, J.P.** *Malnutrition and gastroenteritis in the Gambia.* Transactions of the Royal Society of Tropical Medicine and Hygiene (London), 71(3), 1977, 199-203. Engl. 14 refs.

After studying the environment of a Gambian village, the authors conclude that the prevalence of diarrhea among young children is not due to viral infection but to a lack of food and water hygiene, particularly the hazardous feeding of contaminated gruel. They also point

out that, until sanitary standards are improved, a diet-based nutrition programme cannot be expected to function effectively. (RMB)

- 3788 Sandhu, S.K., Gupta, Y.P., Srivastava, V.P., Gupta, G.C.** *Adoption of modern health and family planning practices in a rural community of India.* International Journal of Health Education (Geneva), 20(4), Oct-Dec 1977, 240-247. Engl. 12 refs.

A study was undertaken in India to determine the relationship between the adoption of appropriate health measures and socioeconomic status, leadership behaviour, level of aspirations, exposure to mass communications, contact with health workers, and knowledge/perceived need of health practices. Several health indicators — antenatal checkups, tetanus toxoid injection (pregnant women), delivery attendance by a trained *dai*, DPT immunization (children aged up to 8 years), and family planning — were selected and weighted to produce an index of health adoption. Both the index of health adoption and questions devised to ascertain socioeconomic status, leadership behaviour, etc., were incorporated into an interview schedule that was then applied to 170 randomly-selected households in five villages served by the Najafgarh Rural Health Training Centre. Analysis of the interviews revealed that the adoption of health practices was significantly related to contact with health workers and knowledge/perceived need but not to any other factors. It is therefore suggested that efforts be made to increase contact with health workers and improve health education. (HC-L)

- 3789 Selwyn, B.J.** *Epidemiological approach to the study of users and nonusers of child health services.* American Journal of Public Health (New York), 68(3), Mar 1978, 231-235. Engl. 18 refs.

A study was undertaken to determine the characteristics of users and nonusers of child health services in an urban ghetto in Cali, Colombia. Analysis of the interview data from a sample of 295 users and 234 nonusers revealed no differences in their socioeconomic characteristics, family size, or level of formal education. Users, however, tended to be younger than nonusers, to have more underfives, to have free medical care through an employer or some other agency, and to have greater knowledge about health and illness and a more positive attitude toward health services. The results of the study were useful in designing and later evaluating a new health care delivery programme for underfives; the methods used in the study are recommended and set forward in considerable detail. (HC-L)

- 3790 Shipley, E., Swanberg, K.G.** *Estado nutricional de la familia rural en el oriente de Cundinamarca. (Nutritional status of the rural family in eastern Cundinamarca).* In Proyecto de Desarrollo Rural Oriente de Cundinamarca, Bogota, PDROC Salud y Nutricion, n.d., 1v.(various pagings). Span. 31 refs.

Unpublished document; see also entry 3697.

A study of the quantity and quality of food consumed by rural families in eastern Cundinamarca, Colombia, was undertaken with a view to designing a nutrition programme for the region. A randomly-selected sample consisting of 259 families, representing both "corn" and "potato" zones of the region, was chosen. Socioeconomic and general characteristics of each family were noted, mothers were interviewed regarding the kinds and quantities of food consumed in the household during the previous 24 hours, and the height and weight of each preschool child were recorded. After considering the sample's diet, the authors concluded that the consumption of protein and calories was determined by income, while the intake of nutrients such as calcium and vitamin A was a question of habit. A nutritional strategy based on raising incomes through increased production and productivity, introducing new foods (e.g., opaco corn) of higher nutritional value, promoting certain nutritious vegetable mixtures, distributing food supplements to preschoolers from child health centres, and conducting nutrition education is recommended. (HC-L)

- 3791 **Sinha, D.P.** *Definitions and overview of the problems of feeding the weaning age group.* *Cajanus* (Kingston, Jamaica), 12(1), 1979, 25-42. Engl. 14 refs.

When making recommendations and formulating guidelines for feeding the weaning age child, health personnel should keep in mind that the child is in a phase of rapid growth and has to learn mastication, acquire digestive and absorptive tolerance to the full adult diet, develop a taste for new foods, and acquire his own immunity to disease. His food, therefore, needs special preparation and mothers must be educated to ensure that weaning is started at the proper time and adequate nutrition consumed. Other circumstances that provide a *milieu* in which malnutrition flourishes are insufficient food, economic poverty, repeated pregnancies, parental ignorance, and disease-prone environment. (AF)

- 3792 **Sinha, V.P.** *Social-ecology and control of mosquitoes.* *Patna Journal of Medicine* (Patna, India), 51(5), May 1977, 105-108. Engl. 8 refs.

Data gathered on mosquitoes are scanty and scattered. Although there are about 3 000 species of mosquitoes throughout the world with a corresponding variety of life-cycle, survival, reproduction, migration rates, etc., there is still a unity between them that could be researched to study their control. With the introduction of pesticides, spectacular results in the eradication of many mosquito-borne diseases (malaria, yellow fever, etc.) have been attained. However, the vectors soon build up a resistance to the insecticides and to newer and stronger ones as they are introduced and increase their area of habitation. So far, all control efforts have concentrated on the mosquito and its life-cycle and environment, but the author suggests that future studies should approach the situation in relation to human sociology and ecology. (AF)

- 3793 **Smith, D.M.** *Health care of people at work: agricultural workers.* *Journal of the Society of Occupational Medicine* (Edinburgh), 27(3), Jul 1977, 87-92. Engl. 8 refs.

Some 200 annual cases of occupational disease in the UK's agricultural sector are caused by physical conditions such as: exposure to cold, noise, and vibrations; infections stemming from contact with animals (e.g., brucellosis, orf, anthrax, salmonella, etc.) or plant matter (allergic extrinsic alveolitis or "farmers' lung"); and exposure to chemical pesticides. This article focuses on the diagnosis and treatment of diseases resulting from pesticides and discusses some of the legislation that has been designed to protect farm workers from the noxious effects of agricultural chemicals. It is suggested that the following steps could further reduce chemical-related occupational diseases: dissemination of information on occupational hazards and notification procedures to general practitioners and hospitals; advising farmers of any new occupational hazards through the media of the press, radio, and television; and educating workers entering agriculture regarding health and safety matters. (HC-L)

- 3794 **Swaminathan, M.C.** *Reaching the target group for supplementary feeding programme.* *Indian Journal of Nutrition and Dietetics* (Coimbatore, India), 14(10), Oct 1977, 308-312. Engl.

The author discusses the reasons why preschool children, the most vulnerable to malnutrition, are unable to participate in supplementary feeding programmes; these include community and family characteristics, environment and location of programme activities, the type and distribution of supplements, socio-cultural factors, and the availability of child care and health facilities. Solutions for the specific problems of working parents, inconvenient feeding centres and schedules, unsuitable supplements, and social disabilities are proposed, such as the development of appropriate child care institutions and take home food services. (RMB)

- 3795 **Trejos C., J.L.** *Investigación interamericana de mortalidad en la niñez en la ciudad de Medellín. (Inter-American investigation of childhood mortality in the city of Medellín).* *Revista de la Escuela Nacional de Salud Pública* (Medellín, Colombia), 1(1), Aug 1978, 63-80. Span.

As part of the 13-phase inter-American investigation into mortality during childhood, a study was undertaken in Medellín, Colombia, to determine as accurately as possible mortality rates for children aged less than 5 years and to shed some light on the environmental, social, cultural, economic and nutritional factors underlying their deaths. The study involved an examination of all recorded births to residents of the city within a certain period, an investigation into the causes of 33% of all recorded deaths of children aged less than 5 years within the same period, and a survey of the home conditions of a sample of families with living under-fives. This paper details the study methodology, findings, and limitations and includes some background information on the city itself. (HC-L)

- 3796 UNICEF, New York. *Nutricion. (Nutrition).*** UNICEF News (New York), (71), 1972, 1-32. Span.

This special issue on nutrition contains articles on social and cultural aspects of malnutrition, the use of vitamin A to prevent and treat blindness, a UNICEF nutrition programme carried out in a village in Upper Volta, pre-packaged food supplements, world food supplies, a Turkish nutrition programme, improving protein consumption, etc. (RMB)

- 3797 van Schaik, T.F. *Nutrition surveys in a population.*** Nutrition and Metabolism (Basel, Switzerland), 20(6), Mar 1976, 387-395. Engl.

The planning and organization of dietary surveys in the Netherlands are outlined. Factors that need to be taken into account before starting a survey include the precise nature of the information required, the choice and number of persons to be surveyed, the method to be used, the method of processing the information received, etc. Several types of survey methods used in measuring food intake are described and grouped into three major categories: weighing and measuring, dietary log-books, and the interview. Data obtained from various food surveys are often collected into a uniform code to facilitate comparisons. (FM)

- 3798 Vazques Vigo, M. *Poblacion rural en America Latina y sus problemas de salud. (Rural population in Latin America and its health problems).*** Salud Publica de Mexico (Mexico City), 14(4), Jul-Aug 1972, 533-537. Span.
Vigesimoquinta Reunion Anual de la Sociedad Mexicana de Salud Publica, Merida, Mexico, 15-18 Nov 1971.

This paper briefly reviews health status and health services in rural Latin America some 10 years after the signing of the Charter of Punta del Este. Considerable advances in the areas of smallpox eradication and malaria control are noted; reductions in infant mortality rates, however, have fallen short of the aims set forward in the charter, as have efforts to provide 50% of all rural dwellers with potable water supplies and sewage disposal. Demographic projections for the rural areas give an idea of the magnitude of the task ahead. (HC-L)

- 3799 Villarroel Arcia, D.A. *Mortalidad infantil: su medicion; cuidados que debemos tener en su obtencion. (Infant mortality; its measurement and precautions that must be taken in calculating it).*** Revista Venezolana de Sanidad y Asistencia Social (Caracas), 40(2), Jun 1975, 369-378. Span.

Infant mortality data can be a sensitive indicator of health status provided that sufficiently representative numbers of births and deaths are registered, that the international distinction between live births and foetal death is adhered to, that the age of the deceased is precisely indicated, and that the geographic origin of the deceased is known. This paper defines the term "infant

mortality" and its sub-classifications "neonatal mortality," "post-neonatal mortality," "early neonatal mortality," and "late neonatal mortality" and point out a number of difficulties commonly encountered in their assessment. Infant mortality data from Venezuela are set forward and some conclusions that may be inferred from them are drawn. (HC-L)

- 3800 Whitehead, R.G. *Some quantitative considerations of importance to the improvement of the nutritional status of rural children.*** Proceedings of the Royal Society of London (London), 199(1134), 19 Oct 1977, 49-60. Engl. 12 refs.
Royal Society Discussion of Technologies for Rural Health, London, UK, 9-10 Dec 1976.

Before planning a nutrition programme for rural children, it is necessary to assess their nutritional status. For this purpose, there are a number of methods for measuring dietary intake, such as weighed food intake, replicate diet analysis, dietary recall, the diary method, etc., all of them about equally effective. Nutrition-infection interrelations should also be examined. Unfortunately, there is a tendency to begin feeding programmes after the problem has become severe. A better approach would be to intervene before the problem has had time to become so serious, i.e., at the prenatal and infant stages, by encouraging prolonged breast-feeding and developing safe pre- and post-weaning feeding procedures. Statistical data and examples from the Gambia are given. (DP-E)

- 3801 WHO, Copenhagen. *International Children's Centre, Paris. Immunization programmes for children; report on a working group with the participation of the International Children's Centre.*** Copenhagen, WHO, 1977. 54p. Engl., Fren., and Russ. 21 refs.

Working Group on Immunization Programmes for Children, Copenhagen, Denmark, 1-3 Sep 1976.

The Workshop on Childhood Immunization was convened to: review the present status of immunization in Europe; discuss problems of a strategic, technical, or legislative nature; and identify specific areas requiring further study. It was recommended that: each individual case of a disappearing disease be carefully studied to develop an eradication strategy; systematic notification of rubella and mumps be introduced; the WHO Regional Office for Europe review and update information on natural immunization policies; all health professionals involved in immunization programmes be trained in the theoretical, educational, and applied aspects of immunization; etc. Research in vaccines, epidemiology, and the operational aspects of immunization programmes is indicated. (HC-L)

- 3802 WHO, Geneva. *Poliomyelitis in 1975/poliomyelie en 1975.*** Weekly Epidemiological Record (Geneva), 52(25), 24 Jun 1974, 205-211. Engl., Fren.

The poliomyelitis cases reported to WHO for the years 1971-1975 are tabulated by country and region and the average yearly number of cases over three previous 5-year periods corresponding to the advent of immunization (1950-1955), the widespread application of killed vaccine (1961-1965), and the widespread application of live vaccine (1966-1970) are similarly presented. It is noted that countries fall into three categories of poliomyelitis control: those with high rates of immunization, where the number of reported cases has dwindled to zero or near-zero; those with little or no immunization coverage, where the disease is on the rise; and those where immunization has been instituted with little effect on the overall occurrence of the disease. Meticulous planning, efficient implementation, and thorough evaluation of immunization programmes are called for. (HC-L)

- 3803 WHO, Geneva. Health needs of adolescents: report of a WHO expert committee.** Geneva, WHO, Technical Report Series No.609, 1977. 49p. Engl.

Also published in French, Russian, and Spanish. Because mortality and morbidity rates are lower during adolescence, relatively little attention has been given to the health of this age group. However, this is a crucial oversight, because behaviour during adolescence is related to mortality and morbidity in later life and to the health and development of the next generation. This report discusses problems affecting the health and well-being of adolescents throughout the world, especially in developing countries. The report summarizes the sources of disease, disability, and suffering during this period, examines their causes, and places health problems within their social context, drawing attention to some unsettling characteristics (e.g., migration and family breakdown) of a society in transition. A number of ways of coping with these problems through innovations in the health services and changes in education and social services are suggested and some areas for further research are indicated. (HC-L)

- 3804 Winikoff, B. Nutrition, population, and health: some implications for policy.** Science (Washington, D.C.), 200(4344), 26 May 1978, 895-902. Engl. 52 refs.

The author discusses some of the biological and behavioural relations between nutrition, population, and health; two specific areas in which these interactions are most closely linked to the concerns of policy makers and health professionals are those of breast-feeding and child health. The advantages of breast-feeding are well documented; child survival appears to be related to such general factors as maternal and child nutrition, child spacing, number of siblings, and societal expectations as

well as the prevailing disease patterns. The reasons why it is hard to base policy on any particular set of scientifically-derived facts are examined and other important implications of these interrelationships for policy are set forth. (DP-E)

- 3805 Wong, H.B. Changing patterns of paediatric diseases in Singapore.** Journal of the Singapore Paediatric Society (Singapore), 18(2), Oct 1976, 51-61. Engl. 20 refs.

From 1962-1975, the infant mortality rate in Singapore dropped from 31.2-13.9:1 000 live births; the perinatal mortality rate, from 26.6-16.6; and the neonatal mortality rate, from 19.1-10.1. These reductions were accompanied by changes in the disease pattern, with relative decreases in the importance of infections, kernicterus, and congenital heart diseases and increases in that of congenital malformation, malignancy, and accidents. This paper discusses the policies that led to these changes and points out some new priorities that have arisen as a result. (HC-L)

- 3806 Woolley, P.O. Salud y desarrollo: una relacion reciproca. (Health and development: a reciprocal relationship).** Servicios Publicos/Desarrollo Nacional, America Latina y Espana (Westport, Conn.), 24(7), Sep 1977, 130, 136, 138, 140-142. Span.

After discussing the characteristics of health and socioeconomic development, the author examines the relationship between them. Development generally contributes to health by facilitating the application of medical technology to mass campaigns aimed at specific diseases, the extension of basic health services, and improvements in nutrition, education, legislation, sanitation, etc., that favour health. Examples from various countries are given. The contribution of health to development (i.e., workdays lost because of illness, nutrition-related mental retardation of future workers) is also considered. (RMB)

- 3807 Zacarias, F., Garcia de Alba, J., Chavez, C., Victoria T., O. Sifilis; algunos aspectos sobre su ecologia y comportamiento epidemiologico. (Syphilis; some aspects of its ecology and epidemiological behaviour).** Salud Publica de Mexico (Mexico City), 18(3), May-Jun 1976, 519-545. Span.

The epidemiology of syphilis in Mexico is reviewed for approximately 30 years. From 1966-1972, some 10 000-14 000 cases were reported each year, many in the early stages, while in preceding years over 20 000 cases were reported annually. The authors question whether this decline represents the true situation, since there have been no recent population surveys. Statistical data are included. (Modified journal abstract.)

III Primary Health Care — Implementation

III.1 Rural Inpatient Care

See also: 3634, 4056, 4175

- 3808 Barker, E.A.** *Surgical techniques and priorities.* Proceedings of the Royal Society of London (London), 199(1134), 19 Oct 1977, 69-72. Engl.
Royal Society Discussion of Technologies for Rural Health, London, UK, 9-10 Dec 1976.

A surgeon with 30 years experience among the Zulus in Africa points out that routine surgical skills and techniques perfected in the West are often viewed as major surgery in developing countries. He outlines the surgical needs of these countries, citing well-known Western surgical practices that can be easily adapted to other settings, including procedures for burns, obstruction, childbirth, congenital defects, cataracts, and cancer. Appropriate technology for techniques associated with surgery, such as anaesthesia, fluid replacement, transport, asepsis, etc., is discussed. He adds that the ability to avoid unnecessary surgery by using such things as antibiotics and inoculation is critical to surgical skill. (DP-E)

- 3809 Cassorla Levy, E., Romero Pizarro, P., Valero Saavedra, X., Arancibia Herrera, A., Martinez Leiva, R., Tapia Aracena, J.** *Experiencia de una unidad de atencion domiciliaria en Chile. (Experience of a domiciliary treatment unit in Chile).* Boletin de la Oficina Sanitaria Panamericana (Washington, D.C.), 82(2), Feb 1977, 132-136. Span.

An urban area of Santiago, Chile, was faced with a heavy demand for inpatient services and no way to increase the number of hospital beds available. In response to this problem, a physician-supervised unit was established to screen hospital patients for early discharge, especially in the pediatrics ward, where the goal was to reduce the average stay by 30%. In addition, a domiciliary treatment unit staffed by physicians, nurses, nutritionists, and social workers evaluated each family's socioeconomic situation and provided follow-up care for patients who returned home. Statistics after 1 year of operation showed a 62.5% increase in discharges and a 46.8% decrease in the length of the average hospital stay. (RMB)

- 3810 Medical Missionary Association, London.** *Take a prison farm and turn it into Transkei's first psychiatric hospital — the story of Dr. Guy*

Daynes' venture. Saving Health (London), 18(1), Mar 1979, 1-3. Engl.

At the request of the Transkei (South Africa) government in 1976, Dr. Guy Daynes undertook to convert the Bizweni prison farm at Umzimkulu into a psychiatric hospital as part of an effort to organize regional psychiatric services. With Dr. Daynes, there are now 2 full-time African doctors, 1 full-time African neurologist, 2 part-time practitioners, and 1 psychiatrist-in-training on staff. In addition to the usual facilities, the hospital has an alcoholic rehabilitation centre, a workshop with modern machinery, a mother and baby clinic, a dietetic research unit, and housing for staff; additional buildings are under construction. Statistical data are included. (AF)

- 3811 Medical World News, New York.** *Blend of healing styles aids Senegalese psyches.* Medical World News (New York), 19(11), 29 May 1978, 38-40. Engl.

In Senegal, Western-trained psychiatrists have learned much about dealing with mental disorders from the traditional African approach, which stresses treatment of the whole person in a social *milieu* with healthy as well as sick people. As a result, Fann Hospital in Dakar has become an open hospital where patients enter and leave as they please and are accompanied by a family member or close friend, native healers mingle freely with staff and patients, and feelings are expressed openly in daily group meetings. A therapeutic village deep in the bush operates along the same lines. Patients usually show rapid improvement, leave after a short stay, and need no further treatment. (DP-E)

- 3812 Sutton, C.** *Practical approach to problems of the parturient diabetic in developing countries.* British Medical Journal (London), 22 Oct 1977, 1069-1072. Engl. 17 refs.

A number of innovations were introduced in 1976 at Lautoka Hospital, Fiji, in an attempt to deal with a high perinatal mortality rate among the infants of diabetic mothers. Pregnant diabetics were admitted earlier and their condition and that of the fetus were closely monitored and appropriate drugs were administered to delay delivery and encourage maturation of the fetus; caesarean sections were performed more frequently to avoid prolonged, stressful labour once the fetus' ability to survive had been determined by means of a shake test. These simple and inexpensive techniques resulted in a neonatal survival rate of 100%. Statistical data are included. (DP-E)

- 3813 Tan, K.L.** *Simple methods in nursery care.* Tropical Doctor (London), 8(1), Jan 1978, 36-39. Engl. 10 refs.

In the Kandang Kerbau Hospital, Singapore, simple methods have been devised to keep infants warm. A lamp, whose construction is described in the article, is fitted to the side of the crib so that it can be adjusted to provide the amount of heat required in each case. This device is efficient, safe, much cheaper than an incubator, and allows for quicker and easier nursing of the infants and cleaning of the cots. The device can also be adapted to provide a mild form of prophylactic phototherapy for non-haemolytic jaundice. These innovations have greatly reduced neonatal mortality and morbidity in the hospital. Statistical data are included. (DP-E)

III.2 Rural Outpatient Care

See also: 3652, 3859, 3920, 3956, 4092, 4139, 4200

- 3814 Adeyokunnu, A.A., Topley, E.** *Sickle cell anaemia; diagnosis and care in a Nigerian health centre.* Royal Society of Tropical Medicine (London), 71(5), 1977, 416-420. Engl.

Sickle-cell anaemia, a hereditary disease with no known cure, affects an estimated 3% of the population of rural Nigeria. Experience has shown that the prognosis of affected individuals can be improved by early diagnosis followed by antimalarial prophylaxis, prompt treatment of infection, and the provision of adequate nutrition and folic acid supplements. Diagnosis and treatment are currently offered in specialist clinics or hospitals but, because of the numbers of individuals involved, this is becoming impracticable. Therefore, a study to test the feasibility of providing these services at the peripheral level was undertaken. At the Igbo-Ora rural health centre, the routine of testing the blood of all anaemic individuals by haemoglobin electrophoresis was introduced in 1971. Following this, the total number of known cases of sickle cell anaemia rose from 9-156 in 4 years. During the same period, new cases diagnosed within 1 year of birth rose from 0-10 — 25% of the expected cases for the size of the target population. Moreover, the percentage of cases diagnosed within 1 year of detecting anaemia rose from 0-94%. In 1973, management of the disease in the form of an antimalarial/folic acid regimen and a monthly sickle-cell clinic was introduced; the clinic has proven popular and has permitted local treatment of the vast majority of the patients. It is concluded that diagnosis and management of sickle-cell anaemia at the peripheral level are feasible and that they should be integrated with the basic health services as soon as possible. (HC-L)

- 3815 Bedoya D., C., Munoz M., M.V., Hernandez Z., A.** *Factibilidad de un programa de atencion domiciliaria y alta precoz del recién nacido prematuro en el Hospital Universitario San Vicente de Paul de Medellin. (Feasibility of a programme of early domiciliary care for premature newborns in the St. Vincent de Paul University Hospital,*

Medellin). Revista de la Escuela Nacional de Salud Publica (Medellin, Colombia), 3(1), Jan-Jun 1977, 80-83. Span.

At the St. Vincent de Paul University Hospital, Medellin, Colombia, the demand for neonatal services exceeds the resources. A study was therefore undertaken to determine the feasibility of a programme involving a shortened hospital stay for selected premature and low-birth-weight babies, health education for their parents, and regular home visits by a supervised auxiliary nurse. Domiciliary care was found to be appropriate for the majority of infants in the neonatal facility and to cost 75% less than hospital care; it also resulted in better quality care for the neonate, better utilization of hospital facilities, and increased health awareness on the part of the community. Its permanent adoption in this and other clinics and hospitals is strongly recommended. (HC-L)

- 3816 Brown, R.C.** *Clinical treatment of tuberculosis in rural Africa.* Tropical Doctor (London), 8(1), Jan 1978, 24-27. Engl.

A Zaire tuberculosis service was reorganized with a view to encouraging patients to continue their treatment until a cure had been achieved. To ensure that drugs were taken as prescribed, the patient's lifestyle was changed minimally, drugs were administered only twice weekly, the taking of medicines was supervised by a nurse, and full payment was demanded in advance, making it more likely that the patient would stay on the programme. To reduce the possibility of a patient becoming refractory to disease, initial treatment involved as many drugs as were available and some drugs were discontinued once the emergence of a drug-resistant strain became very unlikely. To simplify the method of recording progress and treatment, a summary sheet containing only essential information was used. (DP-E)

- 3817 Chen, P.C.** *Providing maternal and child care in rural Malaysia.* Tropical and Geographical Medicine (Haarlem, Netherlands), 29(4), Dec 1977, 441-448. Engl. 14 refs.

As part of a 1957 maternal child health campaign, the government of Malaysia began to establish rural health units, each consisting of a health centre, 4 subcentres, and 20 midwife stations for every 50 000 rural inhabitants. By the end of 1974, 56 units existed. Each unit is staffed by a physician, 13 paramedics, 42 auxiliaries, 20 support staff, and a 4-person dental team. Local training emphasized immunization, nutrition education, and early detection and treatment of disease. The efforts of these rural health units resulted in a sharp drop in infant, maternal, and child mortality and in the incidence of diphtheria and enteric fever. Faecally-related diseases continue to be a problem because of unsafe water supplies. (DP-E)

- 3818 Chlebowsky, H.O., Zielke, E.** *Membrane filtration technique for the diagnosis of microfilaruria.* Transactions of the Royal Society of Tropical Medicine and Hygiene (London), 71(2), 1977, 181. Engl.

A modified membrane filter technique to detect the presence of microfilariae in the blood was used in Lofa County, Liberia, as part of a pilot project on filariasis control. Urine samples of 168 persons were examined by passing a mixture of urine and Teepol through a filter paper. Microfilariae were found in 3 samples from 32 patients with *Wuchereria bancrofti*, but not in the samples of 9 with *Onchocera volvulus*. In other samples, microfilariae were found in 6 of 13 cases of *Wuchereria bancrofti*, all 4 cases of *Onchocera volvulus*, and in 4 of 6 patients with both. It was also shown that the membrane filtration method could detect the presence of schistosoma eggs. (FM)

3819 Friedman, P.S., Wright, D.J. *Observations on syphilis in Addis Ababa: I: general considerations.* British Journal of Venereal Diseases (London), 53(5), Oct 1977, 273-275. Engl.

Ethiopia's only venereal disease clinic, the Ministry of Public Health Venereal Disease Demonstration Centre in Addis Ababa, offers free consultation and treatment to some 1 000 outpatients per day. The centre is staffed by a doctor, a dermatologist, several nurses and dressers, and 2-4 health officers (auxiliaries). The dressers take blood samples, nurses and medical officers examine patients, and the doctor reviews difficult cases. Because of the large numbers of patients seen, staff are unable to ensure reattendance and contact tracing. Moreover, their efforts are hampered by widespread prostitution and an absence of public health education about venereal disease. (HC-L)

3820 Gonoshasthya Kendra, Dacca. *Progress report no.6; dedicated to our paramedic Nizam.* Dacca, Gonoshasthya Kendra, Dec 1977. 12p. Engl. 19 refs.

Unpublished document.

Gonoshasthya Kendra is a community development project designed to help the rural poor of Bangladesh improve their health and economic status; this report discusses project activities for the past 30 months. The project's primary health services are provided by paramedics of both sexes whose work consists mainly of home visiting. The paramedics' functions include: registering births and deaths; identifying pregnant and at-risk women; identifying children prone to diarrhea or malnutrition; immunizing; providing health and nutrition education; treating diarrhea, dysentery, and scabies and teaching mothers a method of oral rehydration; and motivating, supplying, and following-up family planning clients. As a result of their work, a dramatic fall in the incidence of serious diarrhea with dehydration, a marked decrease in scabies and other skin diseases, and a total reduction in maternity deaths in the area fully covered by the service have been achieved. Other project activities have included: cultivation of a type of carp, in tanks, for food; provision of low-interest loans to farmers and fishermen; classes for women in sewing, jute handicrafts, health education, and functional literacy and, more recently, carpentry, blacksmithing, plumbing, and electricity; an inexpensive and culturally appropriate primary school for poor children; and an

active family planning programme. In all of its undertakings, the project evidences a willingness to experiment; the report, therefore, contains accounts of failures as well as successes, so that the readers as well as the project staff can profit from them. A list of 19 papers dealing with various aspects of the life, work, and philosophy of the project are appended. (HC-L)

3821 Hirota, Y., Giri, J.N., Maskay, N.L., Baidya, B.R., Bajracharya, G.M., Nakano, H., Nishijima, Y. *Tuberculosis control programme in Nepal; parts 1 and 2.* Kurume Medical Journal (Kurume-shi, Japan), 24(2), 1977, 81-94. Engl. Refs.

From October 1976-April 1977, a staff of 25, mainly auxiliary health workers and laboratory personnel, conducted a door-to-door tuberculosis control programme for 280 000 rural inhabitants of Nepal. They concentrated on providing BCG vaccinations for children aged less than 15 years and on case-finding by direct sputum examination of suspected patients and ambulatory treatment of positive cases, a method considered more appropriate for developing countries that cannot afford periodic X-ray screening. Statistical data are included. (DP-E)

3822 Morris, J. *Mufakose clinic.* Rhodesian Nurse (Salisbury), 8(4), Dec 1975, 6-8. Engl.

The Mufakose clinic consists of a polyclinic, a maternity unit, and a child welfare unit centrally located in Mufakose Township (population 45 000), Rhodesia. The clinic is staffed by a medical officer, 6 state registered nurses and midwives, and 12 medical assistants and offers a comprehensive programme of maternal and child health and family planning services. So far, the clinic has succeeded in reducing infant mortality to that found in wealthier suburbs and the birth rate (40:1 000) to 10 points below the national average. This paper describes the clinic's organization, administration, methods, and activities. (HC-L)

3823 Paterson, E.H. *Kwun Tong community health project.* Tropical Doctor (London), 8(2), Apr 1978, 85-89. Engl.

See also entry 2407 (volume 4).

The present and future activities of a community health project sponsored by the United Christian Hospital in Kwun Tong, Hong Kong, are described. Based in the hospital itself, the project has gradually acquired four other community health centres, offering outpatient care and dental services. A team of community nurses provides at-home follow-up care and advises on health education and nutrition. An extensive volunteer network is involved in community development. Health maintenance programmes for children and adults encourage regular check-ups and early detection of disease. The "hospital without walls" policy of the hospital staff is designed to deal more effectively with the needs of the community. (FM)

- 3824 Sandhu, S.K., Sinha, K.S., Bawa, P.S., Bharadwaj, N.N.** India, Directorate General of Health Services, Central Health Education Bureau. *Developing sub-centre Lokra in primary health centre — Pataudi.* Research Findings (New Delhi), 10(1-2), Apr-Jul 1977, 5-7. Engl.

In 1973, hostile behaviour on the part of the villagers forced the closing of the Kokra subcentre (India) after 18 months of uneasy operation. Because of the need for this subcentre, the medical officer in charge of the primary health centre decided to take steps to reopen it and his efforts are described. In 1975, the subcentre was reopened; since then, staff morale has been high and their treatment by the villagers has been respectful and cooperative. It is concluded that an unfavourable attitude toward a health service can be overcome through a concerted effort to build up a rapport between staff and community. (HC-L)

- 3825 Stephens, B., Gowers, P., Kennedy, I.** *Patient retained health records in a rural health care system.* Journal of Tropical Medicine and Hygiene (London), 80(11), Nov 1977, 244-248. Engl.

Field trials of patient-retained health records in Botswana have resulted in very high retention rates (98.1%) and numerous advantages to both providers and recipients of services. The three types of cards (male, female, and underfive) are a standard size and fold neatly into a protective plastic envelope; the female card includes a record of obstetric history. The cards are simple to read, easy to fill out, and provide cues for the health workers that help program the delivery of preventive services such as nutrition education, family planning, or malaria prophylaxis. In addition, they eliminate time spent filing and retrieving cards in the clinic, help remove the mystique of medicine and encourage patient responsibility for health care, ensure continuity of care for those who must move from place to place, facilitate referrals by removing the need for history-taking at the secondary level, and are useful in community surveys and community diagnosis. Samples of the female and the underfives' card are included. (HC-L)

- 3826 Stumbo, W.G.** *Rural health centers and the development of progressive patient care.* Clinical Medicine (Northfield, Ill.), 82(7), Jul 1975, 12-16. Engl.

The principles governing the development and operation of a rural ambulatory health care centre in eastern Kentucky are presented. The rural health team is the key element, with the physician acting as a monitor of health care rather than sole provider. Physician extenders play the major role in the care of patients who do not deviate from norms established by the physician. This delegation of tasks leads to more effective and flexible use of personnel. Given the lack of a national health policy, certain organizational changes at the state level must support such health care reforms. (FM)

- 3827 Thomas, J.K.** *Day in the life of a rural health centre nurse.* Jamaican Nurse (Kingston, Jamaica), 16(3), Dec 1976, 28. Engl.

The typical daily routine of a rural public health nurse in Jamaica is described. The procedures of the outpatient clinic and monthly prenatal clinic of a health centre are outlined as the nurses, district midwife, health aides, and centre staff examine patients. Problems encountered range from fractures to diabetes. As part of the prenatal clinic, 49 mothers are interviewed and examined, blood specimens are taken, and urine is tested. (FM)

- 3828 Tully, M.** *Nursing with a research unit in Africa.* Nursing Times (London), 74(10), 9 Mar 1978, 401-405. Engl. 8 refs.

A community health nurse with a nutrition research unit in the rural village of Keneba, Gambia, describes her role. Although its main aim is to study marasmus in children, the unit concerns itself with all aspects of outpatient care and maternal child health. A systematic growth measurement programme was introduced for children aged 3 months-3 years, followed by a food supplement project concentrating on children aged 0-18 months. In the outpatient clinic, medical records are kept for all villagers. An antenatal clinic is attracting more women in the early stages of pregnancy and teaching sessions involve the women directly in hygiene and food preparation. (FM)

- 3829 Villegas, H.** Pan American Health Organization, Washington, D.C. *Extension of health service coverage in Costa Rica.* Bulletin of the Pan American Health Organization (Washington, D.C.), 11(4), 1977, 303-310. Engl.

Also published in Spanish in *Boletín de la Oficina Sanitaria Panamericana* (Washington, D.C.), 83(6), 1977.

In an attempt to extend health services coverage to the entire population, Costa Rica has established a rural health programme directed at villages with fewer than 500 inhabitants. The programme's basic unit is the rural health area, which includes about 2 400 people. In rural health posts staffed by specially trained nursing auxiliaries and rural health assistants, the programme provides, among other services, vaccinations, first aid, disease control activities, maternal and child health care, family planning, and environmental health measures. A complementary programme aimed at peripheral urban areas has also begun. (DP-E)

III.3 Mobile Units and Services

See also: 3844, 4017, 4140

- 3830 Klima, J.E., Shelton, S.W., Baldwin, J.E.** Naval Dental Research Institute, Great Lakes, Ill. *Mobile maintenance facility (dental): a prototype design for dental support for U.S. Navy and U.S. Marine Corps personnel.* Springfield, Va., National Technical Information Service, Nov 1973. 60p. Engl.
See also entry 1665 (volume 3).

A mobile dental unit intended for use in combat zones but equally appropriate for public health programmes has been developed and tested by the US Navy. The van's advantages are that: it is highly mobile and can be transported by aircraft, helicopter, railway flatcar, truck, or ship; its equipment is durable, lightweight, and relatively maintenance-free; it can be set up for operation by the dental team in approximately 2 hours; and it offers the entire range of modern dental treatment except prosthodontia. The van, its supporting equipment, and its utilities services are described; the results of field tests and consequent recommendations and modifications are given; instructions on how to prepare the facility for operation and transport are outlined; and all the instruments and supplies required for approximately 60 days normal operation are listed. A number of photographs and line drawings are included. (HC-L)

- 3831 Robertson, I.** *Community health work in the rural areas of the Cape Province.* South Africa Nursing Journal (Pretoria), 44(1), Jan 1977, 7-8. Engl.

In Cape Province, South Africa, 128 mobile clinics staffed by nurses provide community health services to the rural population. This paper describes the nurses' mobile vans and weekly work schedules, plus the conditions and diseases that they are likely to encounter on a typical day. It is noted that this type of nursing differs greatly from hospital nursing and that the nurse best prepared for it is one who has obtained general and midwifery certification and a 1-year diploma in community health. (HC-L)

- 3832 Sandhu, S.K., Hiramani, A.B., Srivastava, U.** India, Directorate General of Health Services, Central Health Education Bureau. *Evaluation of the mobile hospital camp at Pataudi.* New Delhi, Central Health Education Bureau, Directorate General of Health Services, CHEB Technical Series No.33, Research Paper No.32, 1976. 31p. Engl.

The purpose of the Pataudi mobile hospital camp held from March 1-11, 1975, was to provide integrated medical services, plus some specialist services, to the rural population and a learning opportunity for young medical graduates, nurses, and sanitary inspectors. During the 1st 3 days (the active phase), outpatients were screened, treated, and admitted if necessary. During the last 8 days (the consolidation phase), efforts concentrated on home visiting and preventive medicine. The camp treated a total of 17 582 outpatients during the active phase and 16 114 during the consolidation phase; 532 inpatients were admitted. Evaluation was accomplished by interviewing a sample of patients and staff and through non-participant observation. It is concluded that the camp was worthwhile both in terms of services and learning opportunities but that the large number of patients seen is indicative of a gap between the health needs of the population and the available services. (HC-L)

- 3833 USA, Department of Health, Education, and Welfare, Indian Health Service.** *"Cavalry" to the rescue: Ft. Lewis medical battalion conducts reservation multiphasic screening exercise; report on the Indian Health Service, US Army, Suquamish and Little Boston Clallam Community Screening Projects, November 12-20, 1973.* Seattle, Wash., Indian Health Service, Western Washington Service Unit, Jan 1974. 18p. Engl. Unpublished document; see also entries 3591, 3592, 3902, 3903, 3906, 3918, 3921, 3922, 3923, 3930, 3931, 3932, 3933, 3934, 3935, 4032, 4050, 4051, 4085, and 4100.

In 1973, the 9th medical battalion of the US army, in conjunction with tribal leaders and the US Indian Health Service, conducted multiphasic screening in two Indian communities. Thirty-seven percent of the combined populations of the two communities took part in the screening; this high level of participation is attributed to the outstanding support shown by the tribal administrations and the unflagging efforts of the community health representatives. This paper describes the origin, elaboration, and evaluation of this unique, cooperative community health venture; appendices include the findings of the screening. (HC-L)

III.4 Community Health Education

See also: 3629, 3641, 3666, 3667, 3668, 3715, 3723, 3736, 3763, 3820, 3944, 3981, 3982, 3989, 3992, 3995, 3997, 4000, 4001, 4002, 4021, 4027, 4106, 4108, 4158

- 3834 Bruess, C.E., Gay, J.E.** *Professional preparation of the health educator; a report of a forum sponsored by the ASHA Committee on College Health Education and Professional Preparation.* Journal of School Health (Columbus, Ohio), 46(4), Apr 1976, 222-225. Engl.

A forum on the training of professional health educators in the USA revealed that, although training programmes are not standardized, most offer a core curriculum including: life sciences, behavioural sciences, and professional health preparation; programme options such as school health education, community health education, traffic safety, and patient education; and outside options in useful areas such as public relations, journalism, or public speaking. This paper discusses some problems presently encountered by health educator programmes and indicates some possibilities for their future development; curricula from two health educator programmes are included. (HC-L)

- 3835 Brydone, A.** *Women's clubs and health education in a developing country.* n.p., 23 May 1978. 4p. Engl. Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978. Unpublished document.

For many years, women's clubs in Rhodesia have been involved in teaching health education as well as traditional homecraft skills such as cooking and sewing. Various clubs, acting together under the Women's Group Liaison (WGL), provide basic information to women on nutrition, hygiene, and child care. The article describes the organization, content, teaching aids and methods, and evaluation of the courses offered by the WGL. Other health projects undertaken by the clubs are briefly mentioned. (DP-E)

- 3836 Caribbean Food and Nutrition Institute, Kingston, Jamaica.** *Nutrition education campaign launched.* Cajanus (Kingston, Jamaica), 11(1), n.d., 8-10. Engl.

Jamaica has recently launched a 3-part nutrition education campaign aimed especially at underfives and pregnant and lactating women. The campaign will promote breast-feeding, proper weaning habits, family planning, the utilization of maternal child health services, the keeping of kitchen gardens, and the greater involvement of fathers in the care and welfare of their families. The campaign's 1st phase, which ended in January 1978, consisted of a series of seminars for rural leaders. The 2nd, which is to continue until mid-1980, will make use of radio and television spots and programmes, newspaper features and advertisements, posters, billboards, and calendars to convey health- and nutrition-related messages. The 3rd will consist of distributing educational materials (i.e., brochures, films, etc.) for domestic and health centre use. Further information regarding the campaign can be obtained from its coordinator, Mrs. Norma Soas, Ministry of Health and Environmental Control, 10 Caledonia Avenue, Kingston 10, Jamaica. (HC-L)

- 3837 Colle, R.D., Fernandez de Colle, S.** *Communication factor in health and nutrition programmes; a case study from Guatemala.* Cajanus (Kingston, Jamaica), 11(3), 1978, 151-196. Engl. 22 refs.

See also entry 3425 (volume 5).

A pilot project to develop a communication strategy to improve health and nutrition standards on a rural plantation in Guatemala is described. Interviews with plantation families provided background information and helped establish priorities, needs, and methods. The *pila*, or outdoor laundry centre, was selected as the focal point for the programme and the audio cassette was chosen as the most effective medium. Dramatized tapes dispensed information on breast-feeding, food preparation, use of health services, child health, and the raising of chickens. The format of the tapes is presented in detail, along with the results of formal and informal evaluations of the success of the project. (FM)

- 3838 Cotton, E.** *Education pour la sante et personnel paramedical.* (Health education and paramedical personnel). Archives Belges de Medecine Sociale (Brussels), 34(9-10), Nov-Dec 1976, 549-564. Fren. 17 refs.

The author presents several definitions of health education, pointing out that its main aim is to instill in individuals and communities behaviour favourable to their health and a sense of responsibility for their own welfare. He describes communal efforts in Yugoslavia that are based on the concept of the health visitor, who provides liaison between his community and the medical profession. He also describes a project in Finland where cardiovascular disease prevention is based on health education. In conclusion, he emphasizes the distinction that should be made between the staff of diverse categories concerned with health education activities and the professional health education specialists. (Modified journal abstract.)

- 3839 Fountain, D.E.** *Church and cross-cultural communication in public health; a project in Zaire.* Missiology: an International Review (Pasadena, Cal.), n.d., 103-111. Engl.

A church-sponsored project in Zaire to improve health education and environmental sanitation is outlined. Based on discussions between church and community leaders, an attempt was made to bridge the gap between modern and traditional views of disease and medicine. Traditional beliefs are incorporated into health education to facilitate the understanding and acceptance of the principles of contagion and contamination. Community leaders are then responsible for communicating these ideas to their people, encouraging new behaviour patterns, and enforcing sanitation regulations. Over 4 years, 80 villages have participated in the project. Studies of two villages show a 50% decrease in the prevalence of hookworm and roundworm. (FM)

- 3840 Fulani, T.Y.** *Basic health services for rural areas in Nigeria.* In McNeur, R.W., ed., *Changing Roles and Education of Health Care Personnel Worldwide in View of the Increase of Basic Health Services*, Philadelphia, Pa., Society for Health and Human Values, 1978, 69-79. Engl. Consultation by the Society for Health and Human Values, Bellagio, Italy, 1-7 May 1977.

The Church of the Brethren Mission Rural Health Programme presently operating in Nigeria is a project designed to teach disease prevention by the use of parables. The programme also loans medicines to the villages and trains villagers to carry out health education activities. After tracing the historical background of the programme, the author outlines the procedure for making contact with new villages. Selection, training, supervision, and evaluation of the staff are discussed, as are the matters of medical supplies and programme financing. Problems that have been encountered are listed, plans for expansion are set forth, and programme evaluation, so far favourable, is mentioned briefly. (DP-E)

- 3841 Hallburg, J.C.** *Teaching patients self-care.* Nursing Clinics of North America (Philadelphia, Pa.), 5(2), Jun 1970, 223-231. Engl.

The features of and approaches to teaching self-care to ambulatory patients are discussed. Although the context is the outpatient clinic, the conclusions are applicable in a variety of environments. The nurse-patient relationship is examined with emphasis on differences in attitudes and beliefs as well as the importance of the time-space dimension in teaching. A comparison of approaches designed to plan self-care activities for or with the patient reveal differences in content, nurses' behaviour, and nurse-patient interaction. An experiment was conducted to test the effectiveness of involving patients in the planning process. Certain older, ambulatory patients benefited from this approach. (FM)

- 3842 Honduras, Ministerio de Salud. *Salud publica; programa 9.01: materno infantil de penetracion rural; subprograma: desarrollo integral de la salud comunitaria.*** (Public health; programme 9.01: rural maternal and child health; subprogramme: integrated development of community health). Tegucigalpa, Ministerio de Salud, n.d. 24p. Span.

Honduras' maternal and child health programme is built around the premise that the community, encouraged and motivated by suitably-trained health workers, can identify its own needs and find ways of fulfilling them. This document describes the programme's organization, methodology, resources, and possible modes of expression (i.e., projects) at the local level; a timetable for its implementation in three rural regions is included. Project aims include: the introduction of family, school, and community orchards, henhouses, rabbit hutches, etc., as well as new crops, machinery, and fertilizers; nutrition education courses; the establishment of rural health posts staffed by volunteers; the provision of clean water, sanitation services, etc.; family planning programmes; etc. (HC-L)

- 3843 Iglesias, M., Villafane, P.** Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; informe preliminar sobre organizacion de la comunidad.* (Rural health services system; preliminary report on community organization). Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 1v.(various pagings). Span. See also entries 3670, 3678, 3901, 3924, 4019, 4020, 4021, 4022, 4023, 4924, 4025, 4026, and 4030.

This report presents a descriptive analysis of the activities of nine community organizations sponsored as pilot projects by the health services of the Department of Cauca, Colombia, and the *Centro de Investigaciones Multidisciplinarias en Desarrollo Rural*, Cali, Colombia. The activities described were categorized as productive (e.g., the organization of agricultural or consumer cooperatives), recreational and productive (e.g., raising money for health care by holding festivals and

bingos), and service (e.g., health education). Such integration of health and economic effort was found to arouse the interest of the rural population in community action. The report also describes an attempt to replicate these experiments using rural health promoters as group animators. (HC-L)

- 3844 Martin Gamboa, F., Molina Jimenez, S.** *Programa de salud publica para enseñar a los escolares conceptos basicos de odontologia, higiene bucal y prevencion.* (Public health programme for teaching schoolchildren basic concepts of dentistry, oral hygiene, and prevention). Boletín de Informacion Dental (Madrid), 36(283), Jul-Aug 1976, 17-23. Span.

A community approach to oral health, aimed specifically at primary schoolchildren, was implemented in the city of Temuco, Chile. A mobile team consisting of two dentists and two project staff equipped with films and other audiovisual aids visited each elementary school and instructed the teachers in the importance of oral health and the use of teaching materials designed to promote it. The school then launched a week of intensive instruction in oral health and preventive dentistry that was repeated on two more occasions during the year. In this manner, the two dentists working 4 hours a day reached 802 elementary teachers who, in turn, reached 30 000 schoolchildren during a 2-year period. The team's programme and three sample teaching units are presented; bibliographic and other information can be obtained from the authors. (HC-L)

- 3845 Missak Wassif, I., Mourad, I.** India, Directorate General of Health Services, Central Health Education Bureau. *Upgrading the teaching of health in primary schools in the U.A.R. (United Arab Republic).* Research Findings (New Delhi), 9(3-4), Oct 1976-Jan 1977, 3-6. Engl. Also published in International Journal of Health Education (Geneva), 12(3), 1969.

In 1965, a 10-year training project for teaching personnel was begun in the United Arab Republic with a view to upgrading the quality of health education in the primary schools. The immediate objectives of the training project were to give teachers a clear understanding of their role in improving student health, train them to instill sound health habits in their pupils, and instruct them in simple preventive measures and diagnostic and screening skills. School inspectors, teacher tutors, and specialists in health education, physical education, science, etc., took summer courses in health, nutrition, and health education and passed their knowledge on to local teachers, school administrators, and school nurses. So far, the 1st phase of the project has been evaluated and the curriculum has been modified to put greater emphasis on first aid, nutrition, and educational aids. (HC-L)

- 3846 Ortega, M.M., Mota, V.M., Pina, R.** Instituto Tecnológico de Santo Domingo, Centro de Investigaciones, Santo Domingo. *Encuesta de informacion de base para la evaluacion del programa de*

comunicacion de masas de la Oficina de Coordinacion Nutricional en la region sanitaria IV. (Baseline survey for the evaluation of the mass communications programmes of the Office of Nutrition Coordination in health district IV). Santo Domingo, Instituto Tecnológico de Santo Domingo, Centro de Investigaciones, 1977. 73p. Span. 16 refs.

The Office of Nutrition Coordination, Santo Domingo, Dominican Republic, has designed a pilot project consisting of a series of short, educational radio messages to be broadcast throughout the day over a 1-year period. The project is aimed at mothers of preschoolers and, as a basis for evaluating its impact, a survey has been conducted to determine: their demographic, educational, health, and socioeconomic characteristics; their access to radios and listening patterns; and their knowledge, attitudes, and practices *vis-a-vis* health and nutrition. This report describes the methodology employed in the survey and discusses the implications of its findings; texts of the educational messages are appended. (HC-L)

- 3847 Pontifica Universidad Javeriana, Bogota. *Interdisciplinary approach toward the promotion of breast feeding in Colombia.*** Bogota, Pontifica Universidad Javeriana, Facultad de Medicina, Oct 1974. 17p. Engl.
Unpublished document.

A project has been proposed to develop methods that will encourage Colombian mothers to breast-feed their infants for an extended period of time. The methods will include: dietary supplementation of the mother during pregnancy and the postpartum period; mass educational programmes in the schools, hospitals, clinics, and homes; and the development of better infant weaning diets. This document gives details of the project methodology, phasing, staffing, and budgeting; it also provides extensive background information on the relationship between breast-feeding and economics, child health, fertility, etc., and the current status of breast-feeding in Latin America. (HC-L)

- 3848 Roter, D.L., Li Wang, V. *Attitude and value change: health education contrasts in the US and the People's Republic of China.*** International Journal of Health Education (Geneva), 20(2), Apr-Jun 1977, 90-97. Engl. 20 refs.

Two movements with the same behavioural objective — the US self-care and the Chinese self-reliance movements — are examined in order to contrast their different approaches to health education. While the US approach seeks to influence knowledge, attitudes, and beliefs on the assumption that this will lead to behavioural change, the Chinese seeks to influence values — a more fundamental concept that has traditionally been considered by Americans too sacred and too enduring to be tampered with. Very recently, however, Americans have made limited use of value strategies in the form of value recognition through self-confrontation; experimental research into this form of value change indicates that it can be an ethically acceptable, appropriate, and

effective health education strategy within the US context. (HC-L)

- 3849 Somers, A.R. *Consumer health education; a new-old challenge to allied health education.*** Preventive Medicine (New York), 6(3), Sep 1977, 404-409. Engl. 10 refs.

The author discusses the implications of the new US consumer health education policy and presents the rationale for it: health education should be conducted by a variety of health, education, and communications personnel in a variety of settings; the most successful programmes are aimed at individuals who already have a strong motivation such as chronic illness or disability; school health is the least effective strategy today; etc. Since this policy will require both health education specialists and conventional health personnel, the author examines training and manpower needs. (DP-E)

- 3850 Tomic, B., Nikolic, A., Tomasevic, V. *Ivanjica: a community conquers health.*** International Journal of Health Education (Geneva), 20(2), Apr-Jun 1977, Suppl., 1-17. Engl.

In 1954, a health education programme was initiated in Ivanjica, an underdeveloped area of Yugoslavia, to promote contact between health workers and the people, gain the support of influential individuals and voluntary organizations, and encourage local participation in self-help projects. Two areas of concentration were water supplies and school hygiene. A case history of a successful programme is the village of Mace, where the lack of clean, easily accessible water finally forced the villagers to band together to organize a government-assisted project to pipe water from a nearby spring. The health education lessons learned from this project changed the villagers' attitudes and eventually inspired further community development efforts including toilets and electricity. (RMB)

- 3851 Vetter, N.J., Mehta, H., Tarantola, D. *Impact of city surveillance teams in Bangladesh during the smallpox eradication campaign.*** International Journal of Epidemiology (Oxford, UK), 5(4), Dec 1976, 353-357. Engl.

The last stages of the smallpox eradication campaign in Bangladesh show how high mobility in a population can positively benefit a campaign whose impact depends upon the wide dissemination of information. The information in this case concerned the 500-taka reward offered to anyone notifying the authorities of a genuine case of smallpox. The message was conveyed by single workers equipped with megaphones and stationed at railway stations, bus terminals, and boat landings between 8:30 a.m. and 4:30 p.m. each day and three teams of 8-10 workers moving through their respective high-risk areas (markets, schools, slums, etc.) daily. In order to ensure that the single workers were being positioned to optimal advantage (i.e., where they would catch the attention of those from furthest away), a random sample of individuals at these points was asked where they had come from. The responses of the individuals revealed not only the points at which long-distance

travelers generally arrived but also the hours at which they were most likely to be encountered. In order to discover which districts were knowledgeable and which ignorant of the smallpox reward, workers serving the markets were asked to find out the origin of the 1st 30 people who knew about the award and the 1st 30 who did not during 1 working day. In this way, a city-based campaign was able to achieve an impact over a much wider area than the city itself. It is suggested that these methods of spreading information and measuring the extent of knowledge have implications for the spreading of information about public health and family planning as well as disease control. (HC-L)

3852 WHO, Geneva. *Mothers learn to treat acute diarrhoea.* World Health (Geneva), Jun 1977, 30-31. Engl.

Also published in Arabic, French, German, Italian, Persian, Portuguese, Russian, and Spanish.

The Philippine Department of Health, in cooperation with WHO, is teaching mothers a simple, inexpensive method of treating acute juvenile diarrhea at home. A prepackaged mixture of table salt, baking soda, potassium chloride, and glucose, costing about US\$0.10, is dissolved in a litre of potable water and drunk by the child in order to replace lost fluids. A trial of this method was highly successful and efforts are now being made to involve community leaders in the project. (DP-E)

IV Primary Health Manpower — Training and Utilization

IV.1 Primary Medical Care

IV.1.1 Professional

See also: 3683, 3927, 3976, 3977, 3998, 4003

- 3853** **Asociacion Colombiana de Facultades de Medicina, Bogota.** *Seminario sobre Ensenanza de las Ciencias Sociales y del Comportamiento en las Facultades de Medicina, Medellin, noviembre 12-14, 1974. (Seminar on the Teaching of the Social and Behavioural Sciences in Medical Schools, Medellin, November 12-14, 1974).* Bogota, Asociacion Colombiana de Facultades de Medicina, Apr 1975. 62p. Span.
Seminario sobre Ensenanza de las Ciencias Sociales y del Comportamiento en las Facultades de Medicina, Medellin, Colombia, 12-14 Nov 1974.

Using as a guideline the national objectives for medical education, educators from medical and social science faculties in Colombia met to discuss the potential contribution of the social and behavioural sciences to medical education and strategies for introducing the social and behavioural sciences into the medical curriculum. This document sets forward the national objectives for medical education and summarizes the discussions and conclusions of the seminar's participants. (HC-L)

- 3854** **Asociacion Colombiana de Facultades de Medicina, Bogota.** *Seminario sobre Objetivos de la Educacion Medica para una Medicina de la Comunidad. (Seminar on the Community Health Objectives of Medical Education).* Bogota, Asociacion Colombiana de Facultades de Medicina, Dec 1974. 133p. Span.
Seminario sobre Objetivos de la Educacion Medica para una Medicina de la Comunidad, Villa de Leyva, Colombia, 27-29 Aug 1974.

Medical educators and members of the Colombian Ministry of Health met to review, evaluate, and discuss strategies for implementing community-oriented medical education based on objectives that were approved in 1970 but not yet implemented. Discussion focused on three themes: the characteristics of current medical education and of the health services, the changes needed for a more appropriate medical education, and a critical evaluation of the current product of medical education in the context of the health and social security services. This report presents the papers that were given during the seminar and summarizes the discussions that ensued; the objectives are set down in full in the appendix. (HC-L)

- 3855** **Baquero Angel, J., Ferrer Ferrer, H.** Pontifica Universidad Javeriana, Bogota. *Desarrollo y evaluacion del programa de medicina integral (area rural). (Development and evaluation of an integrated medical programme (rural area)).* Bogota, Pontifica Universidad Javeriana, Facultad de Medicina, Departamento de Medicina Preventiva, Apr 1972. 36p. Span.

Since July 1969, the medical faculty of Pontifica Universidad Javeriana, Bogota, Colombia, has offered 5th-year students a programme of rural medical practice in 12 hospitals and 39 health posts in the departments of Cundinamarca and Boyaca. For 10 weeks, the students rotate through different institutions, performing clinical, administrative, preventive, and investigative activities under the supervision of hospital staff and faculty members. An evaluation of the programme, conducted from July 1969-December 1971, revealed that over 80% of the participating students felt that it had enhanced their knowledge and experience of integrated medicine. (HC-L)

- 3856** **Bicudo Pereira, I.M., Harris, W.M.** *Estagio integrado na Faculdade de Saude Publica da Universidade de Sao Paulo; prepara para o trabalho multiprofissional. (Interdisciplinary training at the School of Public Health of the University of Sao Paulo; a preparation for multiprofessional teamwork).* Revista de Saude Publica (Sao Paulo, Brazil), 10(3), Sep 1976, 257-266. Portuguese. 11 refs.

In 1975, as part of an interdisciplinary effort, students from all disciplines at the Sao Paulo University School of Public Health (Brazil) participated in an experimental health sectorial diagnosis programme by collecting data using parts of the CENDES/PAHO and programme packaging techniques. The students felt that the methodology was too sophisticated and the programme too rigidly controlled, but they did become aware of the lack of morbidity and mortality data in Brazil and the need for activities of this type. Some suggestions for improving the course are presented. (RMB)

- 3857** **Ceitlin, J., ed(s).** Federacion Panamericana de Asociaciones de Facultades de Medicina, Bogota. W.K. Kellogg Foundation, Battle Creek, Mich. *Medicina de la comunidad: un programa de ensenanza-aprendizaje en America Latina y el Caribe. (Community medicine: a teaching-apprenticeship programme in Latin America and*

the Caribbean). Caracas, Federacion Panamericana de Asociaciones de Facultades (Escuelas) de Medicina, 1978. 292p. Span.

From 1966-1970, the Panamerican Federation of Associations of Medical Faculties recognized the need to promote and coordinate the teaching of community medicine in its affiliated universities and subsequently established a community medicine teaching programme. The 1st part of this book traces the history and conceptual bases of the programme; the 2nd describes how it has been adopted in Guatemala, Brazil, Colombia, Venezuela, Bolivia, Jamaica, and Panama; and the 3rd summarizes its results in terms of national programmes initiated, numbers of students exposed to them, etc., and considers future directions. Additional information regarding national programme curricula is appended. (HC-L)

- 3858 Ceitlin, J.** Federacion Panamericana de Asociaciones de Facultades de Medicina, Bogota. Asociacion Venezolana de Facultades (Escuelas) de Medicina, Caracas. *Situacion actual de la educacion medica. (Present status of medical education)*. Bogota, Federacion Panamericana de Asociaciones de Facultades de Medicina, 1974. 37p. Span. 11 refs.
Quinta Conferencia Panamericana de Educacion Medica, "Educacion Medica de Hoy y Atencion Medica del Manana," Caraballeda, Venezuela, 4-7 Nov 1974.

The author assesses the ability of the American (both North and South) system of medical education to produce a highly qualified human resource and influence present and future health care delivery systems. He covers medical schools, medicine as a career, medical students, applicants, faculty, graduates, the curriculum, and health manpower planning and medical education policies. Statistical data are included. (RMB)

- 3859 de la Torre Montejo, E., Casanova Arzola, R.** *Teaching polyclinic and how it works*. Impact of Science on Society (Paris), 26(4), Oct-Dec 1976, 291-297. Engl.

The need for specialists to devote some of their training period to primary care in a supervised setting has prompted the Cuban Ministry of Health to develop teaching polyclinics. A teaching polyclinic is staffed by full-time instructors in the three basic specialties (medicine, pediatrics, and gynaecology/obstetrics), a director with experience in public health administration and teaching, a social psychologist, and part-time consultants from other specialties. Interns from each of the three basic specialties assume responsibility for a fixed number of the polyclinic's patients for approximately 1 year. Preliminary trials of teaching polyclinics have proved so successful that they are to be extended into Havana and the provincial capitals. (HC-L)

- 3860 Federacion Panamericana de Asociaciones de Facultades de Medicina, Bogota.** *Programa Continental de Ensenanza de Medicina de la Comunidad; proyecto de la Facultad de Medicina, Santiago Norte, Universidad de Chile. (Continental Programme for the Teaching of Community Medicine; project of the Medical School, University of Chile, Santiago North)*. Bogota, Federacion Panamericana de Asociaciones de Facultades de Medicina, Feb 1975. 44p. Span.
Unpublished document; see also entries 3861, 3862, 3863, 3864, 3865, 3867, 3882, and 3883.

The University of Chile medical school has designed a project involving the creation of a permanent teaching/demonstration area in Santiago North. The medical faculty is to: assume technical and administrative responsibility for the area; provide its residents with integrated maternal and child health, primary, psychiatric, and dental care; develop teaching programmes for integration within the services; and conduct research relative to health care delivery. This document describes in detail the project's specific objectives, programme components, schedule of implementation, and budget. (HC-L)

- 3861 Federacion Panamericana de Asociaciones de Facultades de Medicina, Bogota.** *Programa Continental de Ensenanza de Medicina de la Comunidad; documento base. (Continental Programme on the Teaching of Community Medicine; basic document)*. Bogota, Federacion Panamericana de Asociaciones de Facultades de Medicina, Dec 1974. 14p. Span.
See also entries 3860, 3862, 3863, 3864, 3865, 3867, 3882, and 3883.

At a 1971 meeting in Bogota, the Pan American Federation of Medical Schools established the operational basis for an international community health programme designed to improve the teaching of community medicine. To implement this programme, a number of Latin American and Caribbean medical schools set up pilot projects with financial aid from the Kellogg Foundation. This document discusses the concept of community medicine, the objectives of the programme and the individual projects, and the methodology that will be used to evaluate them. (RMB)

- 3862 Federacion Panamericana de Asociaciones de Facultades de Medicina, Bogota.** *Programa Continental de Ensenanza de Medicina de la Comunidad; proyecto de la Facultad de Medicina de la Universidad Nacional de San Agustin de Arequipa, Peru. (Continental Programme on the Teaching of Community Medicine; project of the Medical School, St. Augustin of Arequipa National University, Peru)*. Bogota, Federacion Panamericana de Asociaciones de Facultades de Medicina, Oct 1974. 36p. Span.
See also entries 3860, 3861, 3863, 3864, 3865, 3867, 3882, and 3883.

Each medical school in Peru has been assigned a corresponding suburban/rural "region of academic influence" for extramural teaching activities. The medical faculty of the *Universidad Nacional de San Agustín de Arequipa* has prepared a project that aims to provide a community in its area of influence with integrated health services offered by an interdisciplinary team, elicit the participation of the community in the solution of its health problems, and create a model for fostering a problem-solving approach in the student. This document describes in detail the project's: educational, research, and service components; schedule of implementation; budget; equipment; and utilization of auxiliary personnel. (HC-L)

- 3863 Federación Panamericana de Asociaciones de Facultades de Medicina, Bogotá. Programa Continental de Enseñanza de Medicina de la Comunidad; proyecto de la Facultad de Medicina de la Universidad Boliviana Mayor de "San Simón," Cochabamba, Bolivia. (Continental Programme on the Teaching of Community Medicine; project of the medical school of the "San Simón" extension of the University of Bolivia, Cochabamba, Bolivia).** Bogotá, Federación Panamericana de Asociaciones de Facultades de Medicina, Oct 1974. 1v.(various pagings). Span.
See also entries 3860, 3861, 3862, 3864, 3865, 3867, 3882, and 3883.

To train community-oriented physicians, the University of San Simón (Bolivia) initiated a project that would both give health students of all disciplines practical training in the field and improve community health. The history of the university and an outline of Bolivia's health care delivery system are traced. The project's objectives, methodology, activities, facilities, human resources, and budget are examined. Agreements drawn up between the university and participating institutions are included. This project also trains auxiliary health workers. (RMB)

- 3864 Federación Panamericana de Asociaciones de Facultades de Medicina, Bogotá. Programa Continental de Enseñanza de Medicina de la Comunidad; proyecto de la Universidad de Guadalajara, Zapopan, Mexico. (Continental Programme on the Teaching of Community Medicine; project of the University of Guadalajara, Zapopan, Mexico).** Bogotá, Federación Panamericana de Asociaciones de Facultades de Medicina, May 1974. 66p. Span.
Unpublished document; see also entries 3860, 3861, 3862, 3863, 3865, 3867, 3882, and 3883.

Basic information on the University of Guadalajara, the medical school curriculum, and the community of Zapopan (Mexico) is presented. A community health programme was initiated in Zapopan to provide opportunities for physician education, improved community

health services, and research. These aspects of the project are discussed in detail. A methodology for evaluating the project is outlined. Statistical data on the demography and health status of Zapopan are included in appendices. (RMB)

- 3865 Federación Panamericana de Asociaciones de Facultades de Medicina, Bogotá. Programa Continental de Enseñanza de Medicina de la Comunidad; proyecto de la Facultad de Medicina de la "University of West Indies," Kingston, Jamaica. (Continental Programme on the Teaching of Community Medicine; project of the medical school of the University of the West Indies, Kingston, Jamaica).** Bogotá, Federación Panamericana de Asociaciones de Facultades de Medicina, May 1974. 1v.(various pagings). Engl., Span.
See also entries 3860, 3861, 3862, 3863, 3864, 3867, 3882, and 3883.

The background of the University of the West Indies (Kingston, Jamaica) is traced and the development of the 3-year Manchester community health training project, including its organization and objectives, is outlined within a framework of existing health services. Financial details are included. Appendices contain organizational diagrams, present and proposed medical curricula, and statistical data on Jamaican demography and hospital distribution. (RMB)

- 3866 Federación Panamericana de Asociaciones de Facultades de Medicina, Bogotá. Instituto Mexicano del Seguro Social, Mexico. IV curso internacional de salud y población, Mexico D.F., Mexico, 1 marzo-30 junio, 1975. Fourth international course on health and population, Mexico F.D., Mexico, 1 March-30 June 1975).** Bogotá, Federación Panamericana de Asociaciones de Facultades de Medicina, 1974. 40p. Span.

The 4th international course on health and population, like its three predecessors, was organized to provide teachers of health sciences in Latin America with a greater knowledge of population dynamics and their effect upon health. The course was interdisciplinary; topics covered included teaching methodology, curriculum design, statistical methods and techniques of investigation, epidemiology, demography, health planning and programming, the biology of reproduction and family planning, and community medicine. This document gives the necessary information regarding the course objectives, content, admission requirements, scholarships, timetable, duration, and evaluation criteria. (HC-L)

- 3867 Federación Panamericana de Asociaciones de Facultades de Medicina, Bogotá. Programa Continental de Enseñanza de Medicina de la Comunidad; proyecto de la Universidad de San Carlos de Guatemala. (Continental Programme on the Teaching of Community Medicine; project of the University of San Carlos, Guatemala).** Bogotá, Federación Panamericana de Asociaciones de Facultades de Medicina, Aug 1973. 33p. Span.

Unpublished document; see also entries 3860, 3861, 3862, 3863, 3864, 3865, 3882, and 3883.

The Chimaltenango community health project allows the University of Guatemala medical school to provide both practical training for community health physicians and a valuable community service. This document describes: the university background; the new medical curriculum; the project's objectives, implementation, and organization; etc. Details of available personnel and facilities and the project budget are also given. (RMB)

- 3868** **Federacion Panamericana de Asociaciones de Facultades de Medicina, Bogota.** *Programa Continental de Informacion sobre Educacion Medica — PCIEM — version actualizada.* (Continental Information Programme on Medical Education — PCIEM — implemented version). Bogota, Federacion Panamericana de Asociaciones de Facultades de Medicina, Programa de Estudios Especiales, Documento EE-15, Sep 1971. 203p. Span.

On the premise that good administration, effective planning, and constructive evaluation depend on thorough up-to-date information, a standardized system of gathering data on the characteristics of medical education has been devised and implemented in 20 medical faculties in four Latin American countries. The system is to be extended to all medical schools in Latin America, at which time it will not only benefit individual institutions but also provide national and continental registers of resources and needs in medical education. This document describes in detail the organization, operation, and utilization of the system; data collection forms, codes, and keywords are included. (HC-L)

- 3869** **Figueredo Gonzalez, R., Rodriguez Hernandez, P., Rodriguez Guerra, E.** *Utilizacion de los estudiantes de ciencias medicas (fase 1) como trabajadores de salud publica en areas de La Habana metropolitana.* (Students of medical sciences (phase 1) as public health workers in metropolitan Havana). *Revista Cubana de Administracion de Salud* (Havana), 3(3), Jul-Sep 1977, 269-274. Span.

The authors discuss the modifications that have been made since 1969 to a work-study programme for University of Havana (Cuba) medical students to adapt it to the setting of the community polyclinic. As part of clinic health teams, students will be encouraged to develop contacts with other health workers, follow up nonattenders and at-risk patients, give lectures on health education topics, take psychiatric histories, participate in environmental health activities, etc., in addition to taking part in normal clinic routines. The distribution of these students in the Havana area is described. (RMB)

- 3870** **Fulop, T.** *New trends in higher education in public health.* WHO Chronicle (Geneva), 31(9), Sep 1977, 373-376. Engl. 10 refs.
See also entry 2833 (volume 5); also published in French, Russian, and Spanish.

A number of countries have found that the best way to develop appropriate higher education in public health is to organize curricula on a problem-solving rather than a discipline basis. The *Universidad Autonoma Metropolitana* in Mexico City, for example, offers a 2-year programme leading to a master's degree in social medicine whose curriculum is based entirely on the study of community problems; disciplines such as epidemiology, biostatistics, and health services management are introduced only when relevant. The implications of this and other such innovations for public health programme structures are discussed in this paper. (HC-L)

- 3871** **Johnson, R.B.** *Self-instructional Materials Project — the Health Sciences Consortium.* Chapel Hill, N.C., University of North Carolina, 1974. 8p. Engl.
Fifth Panamerican Conference on Medical Education, "Medical Education Today and Medical Care Tomorrow," Caraballeda, Venezuela, 4-7 Nov 1974.

A method of programmed teaching that allows medical institutions to share effective instruction has been developed in the USA. The method involves training volunteer faculty members through on-campus workshops to prepare packaged materials that, after being tested and revised, are made available to a consortium of institutions. Each package contains a series of short instructional steps, practice exercises, and feedback consistent with a set of specified objectives; it is accompanied by a post-test to measure its effect on the student. At the time that this paper was written, several thousand packages were under production in the USA and the model had successfully been used in Latin America, Europe, Canada, and Africa. This document describes the logistics of its implementation. (HC-L)

- 3872** **Lathem, W.** *Medical education; reform for developing countries.* *Medical Education* (Oxford, UK), 11(1), Jan 1977, 65-70. Engl. 27 refs.

The conventional departmental structure of medical schools in the developing countries is an obstacle to a more appropriate medical education. This paper presents a model for a medical school whose departmental structure is based on the major categories of health problems rather than on clinical and scientific disciplines. The model includes departments of communicable diseases, nutrition, population, and general medicine plus offices of health care delivery and health education; the clinical and basic sciences are introduced under these categories as required. Possible objections to this model are anticipated and refuted. (HC-L)

- 3873** **Lathem, W.** *Community medicine: success or failure?* *New England Journal of Medicine* (Boston, Mass.), 295(1), 2 Jul 1976, 18-23. Engl. 12 refs.

The development of university-based community medicine programmes represents a fundamental reform in medical education in recent times. These programmes have attempted to train and motivate students to undertake research and innovations in health services and

health care systems and to provide service to those in need. The author questions the relevance, value, and effectiveness of community medicine in the USA and suggests that, since community medicine in developing countries is also ineffective when isolated from broader socioeconomic development, it should be abandoned as an independent undertaking. (Modified journal abstract.)

- 3874 Llorens Figueroa, J.A., Araujo Bernal, L., Douglas Pedroso, R., Pelayo Gonzalez-Posada, E., Ordonez Carceller, C., Rodriguez Guerra, E.** Cuba, Ministerio de Salud Publica. *Combinacion del estudio y el trabajo en la formacion de los profesionales de la salud. (Work-study programmes for training health professionals)*. Revista Cubana de Administracion de Salud (Havana), 3(2), Apr-Jun 1977, 151-181. Span.

The organization of health services in Cuba is described with an historical outline of medical education from its early stages to the present. Emphasis is placed on changes brought about by the socialist revolution and on socioeconomic factors affecting the development of health services and training. A combination of formal study and practical work forms the basis of the professional medical curriculum. Community health is stressed throughout the training period. This study-work principle and its relation to the needs of the socialist state is explored in detail. (Modified journal abstract.)

- 3875 MacFadyen, D.R.** *Medical education in Afghanistan*. Canadian Medical Association Journal (Ottawa), 118(1), 7 Jan 1978, 10-11. Engl.

Travel restrictions, both to and from Afghanistan, limit the quantity and quality of training available to national physicians. To overcome this, CARE/MEDICO in 1961 established a teaching programme in medicine and surgery staffed by visiting specialists, who have faced dangerous conditions with poor resources and facilities in order to improve the level of health care in Afghanistan. Meanwhile, the goal of this and similar programmes is to make such visits unnecessary. One possible alternative solution is advanced overseas training of selected graduates of the present training programmes and/or Afghan medical school faculty. Some initiative must be shown by Afghanistan. (DP-E)

- 3876 Mackintosh, M.E., Ross, W.F.** *Rural health teaching programme for final-year medical students, 1968-1977*. South African Medical Journal (Capetown), 54(22), 25 Nov 1978, 914-915. Engl.

In 1968, the Godfrey Huggins School of Medicine in Salisbury, Rhodesia, instituted an interim plan to involve final-year medical undergraduates in the social and psychological aspects of disease and the problems of rural health services by setting up training clinics near a rural hospital. The students were able to study the common ailments of patients, contribute to the continuing education of medical assistants, and assist at antenatal and child welfare clinics. In 1977, student assignments

included nutrition and immunization surveys, an epidemiological study of neonatal tetanus, school medical examinations, and a survey of risk factors associated with organophosphorus compounds. (AF)

- 3877 Martin, D.P., Gilson, B.S., Bergner, M., Bobbitt, R.A., Pollard, W.E., Conn, J.R., Cole, W.A.** *Sickness impact profile: potential use of a health status instrument for physician training*. Journal of Medical Education (Chicago, Ill.), 51(11), 1977, 942-944. Engl.

A patient and physician may have different assessments of the patient's health status. Knowledge of this divergence of views can be obtained by use of the Sickness Impact Profile (SIP), the result of a questionnaire completed by both parties. The SIP has implications for medical education and the medical care process, enabling future physicians to gain insight into patient values and promoting a physician-patient relationship that would facilitate congruence in assessment of the patient's health status. (DP-E)

- 3878 McGregor, M.** *Governments and medical schools*. New Zealand Medical Journal (Wellington), 85(587), 11 May 1977, 383-385. Engl.

In the last 20 years, health care has come to be regarded as a right rather than a privilege. This change in attitude has created problems for the medical profession. For example, greater availability of health services has led the public to expect better health, something that cannot easily be delivered in what is really a "sickness system." The demand for more family doctors has affected the traditional research role of the medical school and made selection of students more difficult. Rising costs and methods of paying physicians must also be examined. (DP-E)

- 3879 Menegazzo, L.** de Asociacion Venezolana de Facultades (Escuelas) de Medicina, Caracas. Federacion Panamericana de Asociaciones de Facultades de Medicina, Bogota. *Capacitacion del docente para la educacion medica del manana. (Preparing the medical educator for the medical education of tomorrow)*. Caracas, Asociacion Venezolana de Facultades (Escuelas) de Medicina, 1974. 11p. Span.
Quinta Conferencia Panamericana de Educacion Medica, "Educacion Medica de Hoy y Atencion Medica del Manana," Caraballeda, Venezuela, 4-7 Nov 1974.
Unpublished document; see also entries 3620 and 3625.

It is difficult, if not impossible, to introduce new concepts of medical practice by means of traditional methods. Efforts to adapt Latin American medical education to the needs of the population have, in the past, been confounded by medical educators whose approach is limited to the magisterial lecture and the bedside demonstration. The author recommends devoting greater attention to the pedagogic formation of medical educators and presents a number of guidelines derived from a training programme for medical educators that has

been offered by the Panamerican Federation of Associations of Medical Faculties since 1971. (HC-L)

3880 Micozzi, M. *Alternative medical education schemes in the Philippines.* *Modern Medicine of Asia* (Hong Kong), 13(9), Sep 1977, 26-30. Engl.

Two innovative medical education programmes are being undertaken in previously underserved areas of the Philippines. The Davao Medical School, Mindanao, has devised a curriculum for community health physicians that includes cultural studies and the art of communication and offers an auxiliary training programme that is taught by the medical students themselves. The Institute of Health Sciences, Tacloban, Leyte, provides 6 years of post-secondary training. After 18 months, the student can graduate as a midwife; after 30 months, a public health nurse; after 3 years, a Bachelor of Science in Rural Medicine; and after 6 years, a physician. It is hoped that these alternative approaches to medical education will help alleviate the shortages, maldistribution, and cost of health personnel in the Philippines today. (HC-L)

3881 Morris, V.D. *Positive approach to the utilization of student feedback in medical education.* *Journal of Medical Education* (Chicago, Ill.), 51(7), 1976, 541-545. Engl.

The author presents a rationale and a systematic procedure for the construction, implementation, and analysis of medical student feedback data that will provide valuable, reliable information about specific areas of the educational process that can be influenced by the behaviour of the instructor. This information can then be combined with other factors and used for continuous improvement of the teaching/learning process. Student questionnaires for evaluating instructors, lecture courses, laboratories, and clinical rotations are included. (Modified journal abstract.)

3882 Pan American Federation of Associations of Medical Schools, Bogota. *Continental Program on the Teaching of Community Medicine; project of the School of Medicine of the "Universidad del Valle," Cali, Colombia.* Bogota, Pan American Federation of Associations of Medical Schools, Nov 1973. 33p. Engl.

Unpublished document; see also entries 3860, 3861, 3862, 3863, 3864, 3865, 3867, and 3883.

The background of the Division of Health Sciences of the *Universidad del Valle* (Cali, Colombia), is traced and past programmes are evaluated. The author discusses the steps that the university followed in an attempt to meet the community health needs of the region: an analysis of local health problems, the design of strategies for new health services and the creation of a health team, the establishment of an appropriate training programme, and the restructuring of the Division of Health Sciences. Projects initiated to implement each step and the resulting community health programme are described. Details on available personnel, facilities, and finances are included. (RMB)

3883 Pan American Federation of Associations of Medical Schools, Bogota. *Continental Program on the Teaching of Community Medicine; project of the School of Medicine of the University of Panama, Panama.* Bogota, Pan American Federation of Associations of Medical Schools, Aug 1973. Iv. (various pagings). Engl.

Unpublished document; see also entries 3860, 3861, 3862, 3863, 3864, 3865, 3867, and 3882.

The University of Panama medical school has implemented a project that gives medical students, even in their 1st year, practical experience outside the university teaching hospital. It is hoped that, with early exposure to community problems, the students will better understand the concepts of health education, rehabilitation, and prevention. Details on the university and the medical school, curricula, finances, and project planning and implementation are included. (RMB)

3884 Pire Rodriguez, A., Fernandez Sacasas, J.A., Garcia Bertrand, F. *Educacion del internista en la comunidad. (Training of the intern in the community).* *Revista Cubana de Administracion de Salud* (Havana), 3(3), Jul-Sep 1977, 265-268. Span. 9 refs.

The authors advocate physician training in the community rather than the hospital setting as better preparation for serving the needs of the Cuban people. Training should emphasize health education, preventive medicine, diagnosis, treatment, and rehabilitation and teach the general practitioner to handle adult patients and a variety of administrative, teaching, and research activities. Specialist training will be carried out during hospital residency programmes. (RMB)

3885 Pontifica Universidad Javeriana, Bogota. *Evaluacion del programa de "medicina integral" practica extramural zona rural; 1er. semestre — 1972. (Evaluation of the extramural programme of integrated medical practice in a rural zone; 1st semester — 1972).* Bogota, Pontifica Universidad Javeriana, Facultad de Medicina, Departamento de Medicina Preventiva, n.d. 15p. Span.

As part of their 6th-year curriculum, medical students at the *Pontifica Universidad Javeriana*, Bogota, Colombia, are required to complete an extramural programme in rural practice. The programme consists of 48 days of in-service training in a hospital in one of two rural areas, Cundinamarca or Boyaca. In 1972, the 38 students who participated in the programme were asked to keep an hourly record of their activities and to reply to a questionnaire concerning the programme's usefulness, the adequacy of supervision, etc. The students' replies were highly favourable; they are presented in this document along with the students' suggestions and a breakdown of their activities during the programme. (HC-L)

3886 Rodriguez, M.I. *Estudiante de medicina; su distribucion en las Americas, 1971-1972. (Survey of medical students in the Americas, 1971-1972).* *Educacion Medica y Salud* (Washington, D.C.), 8(4), 1974, 360-389. Span.

The student population of 274 medical schools in 24 American countries was analyzed for the 1971-1972 academic year in terms of number, sex, courses of study, and nationality. It was found that, since 1967, the total number of medical students had risen by an average of 15.7% a year, a total of 62.8%, as compared to a 26.4% increase in the USA during the same period. The author examines the two main factors contributing to greater enrollment: the increased number of schools and increased admissions. The number of expatriate medical students ranged from 10% in Argentina to 0.2% in Haiti, with local variations within each country. The extent to which students left their native countries to attend foreign universities appeared to be related to the ease or difficulty of gaining admission to a medical school at home. The author suggests that there is a need to consider the qualitative as well as the quantitative aspects of medical education when designing national plans for health manpower development and that the repercussions of undergraduate migration be examined. Statistical data are included. (Modified journal abstract.)

- 3887 Schandorf, A.** *Junior medical officer; ansat at Ghana's militaerregering. (Junior medical officer; employed by the military government in Ghana).* Ugeskrift for Laeger (Copenhagen), 139(21), 23 May 1977, 1268-1271. Danish.

The daily routine of a staff physician or junior medical officer in the mental hospital of Accra, Ghana, is discussed. In addition to treating the hospital staff and their families, the officer must deal with the increasing prevalence of parasitic diseases, particularly onchocerciasis, malaria, and schistosomiasis, among both staff and patients. Standards of environmental hygiene are poor and prophylactic measures scarce. With regard to treating psychiatric problems, a limited but adequate supply of psychotropic drugs is locally made. Cultural beliefs and superstitions, such as an increasing belief in witches, complicate treatment. The author points out that the officer's salary is low but the position offers challenge and satisfaction to an unmarried doctor. (Modified journal abstract.)

- 3888 Sinclair, S., Joseph, G.** *Nariala: an experiment in undergraduate education.* Indian Pediatrics (Calcutta, India), 12(11), Nov 1974, 1051-1056. Engl.

In order to stimulate their interest in preventive and social medicine, senior students at the All-India Institute of Medical Sciences (AIIMS), New Delhi, India, are required to spend 3 days per week during a 3-month period in a rural village (Nariala) and hospital (Ballabgarh). There, under the supervision of faculty members from the AIIMS, the students provide medical services and collect data on the villagers' health problems, socioeconomic status, culture, and knowledge, attitudes, and practices regarding health. This data is summarized in the 2nd part of the paper. (HC-L)

- 3889 Universidad de Costa Rica, Facultad de Medicina, San Jose.** *Documento para ser presentado al Seminario Nacional de Educacion Medica. (Document to be presented at the National Seminar on Medical Education).* San Jose, Universidad de Costa Rica, Facultad de Medicina, 1 Oct 1973. 2v.(various pagings). Span. Refs.

Recognizing the need to train greater numbers of more appropriately qualified physicians, the University of Costa Rica initiated an evaluation of its medical curriculum. From 1972-1973, four workshops — one each on teaching methodology, curriculum objectives, audiovisual aids, and student evaluation — were held; further workshops and a commission established objectives, recommendations, and a theoretical model for curricular reform. These two volumes comprise the principal reports arising from the workshops and commission. (HC-L)

- 3890 WHO, Geneva.** *Away from the ivory tower; student health workers live and learn in field training areas.* WHO Chronicle (Geneva), 31(5), May 1977, 175-181. Engl.

Also published in French, Russian, and Spanish.

Experience in field training areas helps prepare medical students for service in developing countries. Training areas should provide an adequate data base and sufficient staff to ensure no more than three students per instructor and be large enough to avoid "population fatigue" and accommodate an adequate range of services and personnel. A minimum 2-months field training should be complemented by coursework in the basic and applied aspects of community medicine. Some recommendations regarding the establishment of field training areas in developing countries are set forward. (HC-L)

IV.1.2 Nonprofessional

See also: 3532, 3591, 3711, 3838, 3840, 3856, 3862, 3863, 3987, 3988, 4004, 4009, 4018, 4019, 4020, 4021, 4022, 4023, 4024, 4026, 4029, 4032, 4034, 4036, 4037, 4039, 4040, 4041, 4042, 4050, 4051, 4052, 4053, 4058, 4076, 4099, 4100

- 3891 Acuna, H.R.** *Physician's assistant and extension of health services.* Bulletin of the Pan American Health Organization (Washington, D.C.), 11(3), 1977, 189-194. Engl.

Fifth Conference on Health Practitioners, Houston, Texas, 18 Apr 1977.

The author describes the changing attitudes among health professionals that led to the 1971 WHO resolution to give priority to the training and utilization of health auxiliaries who could relieve professionals of simple tasks and administer to people who would not otherwise be covered by health services. Some countries have decided that this role can best be filled by the medical assistant, who either assists a physician directly or performs certain specified tasks under the intermittent supervision of a physician. The training and functions of medical assistants in various countries are described and evaluated, although the author stresses the need for

additional, especially cost effectiveness, studies. (RMB)

- 3892 Arboleda G., R.** Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; metodologia CIMDER para adiestramiento de promotoras rurales de salud. (Rural health services system; CIMDER methodology for training rural health promoters)*. Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Sistema Rural de Servicios de Salud, 1977. 23p. Span. Refs.

This document describes a methodology for evaluating and adapting the recruitment procedures, selection criteria, curricula, teaching methodology, working tools, and performance of Colombia's rural health promoters. Application of the methodology to a group of 18 students helped develop good recruiting and selection methods that reduced the dropout rate, appropriate teaching techniques that enabled people with a basic education to assimilate difficult material, an appropriate teaching environment that improved promoter-community relations, and a promoter-maintained information system that facilitated community diagnosis. (HC-L)

- 3893 Beltran, O., Drayton, H., Gilliespie, G.M.** Organizacion Panamericana de la Salud, Washington, D.C. *Utilizacion de nuevos tipos de personal para la extension de servicios de salud. (Utilization of new types of personnel for the extension of health services)*. Washington, D.C., Organizacion Panamericana de la Salud, 1973. 42p. Span. 49 refs. Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973. Bound with entries 3519, 3533, 3684, 3955, and 3970 in entry 3532.

Chapter 1 of this conference paper discusses recent programmes in Latin America for the training and deployment of auxiliary health workers in primary and dental care and maternal child health. Chapter 2 examines: the sick-nurse dispenser, the medical auxiliary, and the medical ranger programmes in Guyana; the community health aide programme in Jamaica; and the nursing auxiliaries' programme that forms part of the new simplified medicine system in Venezuela. Costa Rica's rural health programme and the training and utilization of dental health auxiliaries in Jamaica are the subjects of chapter 3. (RMB)

- 3894 Butt, H.W.** Indo-Dutch Project for Child Welfare, Hyderabad, India. *Training programme for gram svasthikas (village health agents)*. Hyderabad, India, Indo-Dutch Project for Child Welfare, n.d. Iv. (various pagings). Engl.

A training programme for village health workers has been designed for implementation in 34 villages covered by the Indo-Dutch Project for Child Welfare, Hyderabad, India. Trainees will be selected from among

women with 5 years education, preferably indigenous midwives. The 12-day course will cover maternal and child health, first aid, nutrition education, health and sanitation, family planning, record-keeping, and interpersonal relations. In exchange for an honorarium rather than a salary, the village health workers will be expected to attend minor ailments, conduct health education, detect pregnancies, give family planning advice, refer complicated cases to the health centre, and collect demographic information. Details of the village health workers' job description and curriculum are included. (HC-L)

- 3895 Cabrera Meza, L., Gomez Duarte, C.E., Viau, F.** *Syllabus sobre el analisis ocupacional en la formacion de auxiliares de salud; IV parte del informe final. (Syllabus on occupational analysis in the training of health auxiliaries; part IV of the final report)*. Guatemala City, Academia de Ciencias Medicas, Fisicas y Naturales de Guatemala, n.d. Iv. (various pagings). Span. Seminario sobre el Desarrollo de una Metodologia para el Adiestramiento de Auxiliares de Salud, Guatemala City, Guatemala, 16-23 May 1976.

Experience in Guatemala has shown that the traditional method of training health professionals, which seeks to inculcate a set of general principles for application in non-specified situations, is inappropriate to the training of lower- and middle-level health workers. These workers need specific training in the tasks and functions that they will be required to perform on the job. This document describes in detail a methodology for developing a curriculum for such workers that is based on occupational analysis and strict definition of functions. (HC-L)

- 3896 Children in the Tropics, Paris. Community (or village) health agent.** Children in the Tropics (Paris), (108-109), 1977, 33-37. Engl.

The community health agent (CHA) is generally chosen by his neighbours in the village and trained by a professional with a clear understanding among all concerned as to the CHA's duties and working conditions. The CHA, usually unpaid except for gifts or services, should be a middle-aged person with a family since this gives some stability to the position. Relying on village resources, the agent will be concerned with such matters as hygiene, maternal care, water supply, and nutrition education. (DP-E)

- 3897 Children in the Tropics, Paris. Training the community health agent.** Children in the Tropics (Paris), (108-109), 1977, 42-49. Engl.

Training sessions for community health agents (CHAs) should be brief (2-3 weeks) with a limited number of concepts to be learned. They should be held in the area where the CHA is going to work and be augmented by refresher courses and regional meetings. A "question and answer" format and demonstrations and practice exercises are the best teaching tools. A manual should be supplied. It is important to define training goals based on community needs. The fundamentals of health

care should be stressed with emphasis on major health problems. A sample curriculum and schedule are included. (DP-E)

- 3898 Children in the Tropics, Paris.** *Community's contribution to the programme; support by the government agencies.* Children in the Tropics (Paris), (108-109), 1977, 50-52. Engl.

The community, government agencies, and the health service can all make important contributions to the success of a primary care programme. The community can provide a health or lying-in hut, give the community health agent (CHA) a voice in the village council and help in his activities, assist in defining training goals, evaluate the CHA, and help finance the programme. Government agencies and health services representatives can provide support by having him participate in regional projects and making it clear to the village council that the CHA is a valued partner in the village health care system. (DP-E)

- 3899 Children in the Tropics, Paris.** *Supervision and evaluation.* Children in the Tropics (Paris), (108-109), 1977, 53-55. Engl.

In order to supervise and evaluate a community health agent (CHA), the supervisor must make regular visits to the village. The head of the village should be visited first in order to get his views on the programme. The supervisor should approach the CHA as an advisor rather than as an inspector. Notes should be made on the treatment records, drug management, accounts, education and environment improvement projects, the CHA's attitude, and village reaction to the programme. Evaluation, while assessing progress, promotes continuity and helps one village to gain from the experience of another. (DP-E)

- 3900 Drayton, H.** Organizacion Panamericana de la Salud, Washington, D.C. *Nuevos tipos de personal de salud para areas rurales; algunas experiencias en el Caribe y Venezuela.* (New types of health personnel for rural areas; some experiences in the Caribbean and Venezuela). Washington, D.C., Organizacion Panamericana de la Salud, n.d. 30p. Span. 38 refs. Unpublished document.

Shortages, maldistribution, and poor utilization of medical professionals have prompted numerous Latin American and Caribbean countries to train one or more cadres of auxiliary health personnel. This paper discusses the training and functions of: Guyana's "sick-nurse dispensers", medical auxiliaries, medical rangers, and multipurpose health workers; Jamaica's community health aides; and Venezuela's nurse auxiliaries. A brief description of each country's geography, demography, health status, and health resources prefaces the discussions. (HC-L)

- 3901 Echeverri, O.** Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali,

Colombia. *Sistema rural de servicios de salud; instrumentalizacion de la promotora rural de salud.* (Rural health services system; equipping the rural health promoter). Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 17p. Span 13 refs.

See also entries 3670, 3678, 3843, 3924, 4019, 4020, 4021, 4022, 4023, 4024, 4025, 4026, and 4030.

A number of simple tools to assist the rural health promoter have been adapted and tested in Colombia. They include: the "belt of three colours" — an instrument for assessing child nutrition status; an inexpensive, easy-to-use well chlorinator; a micro-laboratory for performing simple diagnostic tests; a micro-health post — a box of supplies for treating simple ailments and providing first aid; a family medical manual; and a portable register for medical and statistical records. The possession of such tools has been shown to enhance the prestige of the rural health promoter and to stimulate community support for the health services. (HC-L)

- 3902 Edwards, P.Q.** USA, Department of Health, Education, and Welfare. *Community health representative; course syllabus.* Tucson, Arizona, Indian Health Service, Desert Willow Training Center, 23 Sep 1977. 1v.(unpaged). Engl. Unpublished document; see also entries 3591, 3592, 3833, 3903, 3906, 3918, 3921, 3922, 3923, 3930, 3931, 3932, 3933, 3934, 3935, 4032, 4050, 4051, 4085, and 4100.

This 3-week course for community health representatives (CHRs) in the allied health services for US Indians and Alaskan natives is designed to introduce the student to the basic concepts of health and disease, individual and group communications skills, a problem-solving approach to health planning, and the role of the community health worker in community health problems and health resources. It also offers certification in standard first aid and defensive driving courses. This document contains an outline of course content and performance objectives, information regarding teaching methodology and student evaluation, and a list of the books, pamphlets, films, and teaching aids used in the course. (HC-L)

- 3903 Edwards, P.Q.** USA, Department of Health, Education, and Welfare. *Community health representatives — a lesson in rural health care.* Tucson, Arizona, Indian Health Service, Desert Willow Training Center, n.d. 11 p. Engl. Twenty-fourth Annual Meeting of the Western Gerontological Society, Tucson, Arizona, 11 Apr 1978. Unpublished document; see also entries 3591, 3592, 3833, 3902, 3906, 3918, 3821, 3922, 3923, 3930, 3931, 3932, 3933, 3934, 3935, 4032, 4050, 4051, 4085, and 4100.

This paper discusses the role of the community health representative (CHR) in helping US Indian and Alaskan minorities to identify and fulfil their health needs. It

also describes three programmes that were devised as a result of initiatives taken by CHRs: a series of protocols that enable them to provide independent, direct care for acute gastroenteritis, acute lower respiratory infections, and other common ailments; a training course in planning a health programme on the basis of epidemiological concepts and methods; and a family planning workshop. A sample disease protocol and the curriculum for the training course are appended. (HC-L)

3904 Eibenschutz, C. *Técnicos en salud comunitaria. (Community health technicians).* Educación Médica y Salud (Washington, D.C.), 10(3), 1976, 293-301. Span.

Since, in rural areas, health conditions cannot be improved without complementary improvements in social and economic conditions, the School of Community Health (Mexico) was created to train health auxiliaries who would also have a background in agriculture and the social sciences. After completing a 2-year curriculum covering these three areas, community health technicians are able to understand and manipulate the rural milieu, organize community activities and environmental health measures, treat and prevent common diseases, carry out maternal child health programmes, conduct basic laboratory tests, and diagnose and refer complicated cases. The author discusses some of the problems encountered by 1975 graduates. (RMB)

3905 Ennever, O. *Experimental pilot training programme.* In *Alternatives in the Delivery of Health Services*, Mona, Jamaica, University of the West Indies, Department of Social and Preventive Medicine, 1976, 10-20. Engl.
Seminar/Workshop on Alternatives in the Delivery of Health Services, Castries, St. Lucia, 8-12 Nov 1976.
For complete document see entry 3012 (volume 5).

The Experimental Pilot Community Health Aide Training Programme, a project of the Jamaican government, was designed to prepare people of limited formal education to work as health auxiliaries with professional supervision. Eleven unemployed, community-oriented people were selected for the 4-month course. After a 4-week initiation period, the trainees split their time between the classroom and the field, where they were trained to assist professionals with routine matters in clinics and in the community. Qualified aides undergo continuing education and their performance is assessed periodically. A similar programme concentrating on child nutrition has been implemented in rural Jamaica. The success of such programmes indicates that effective care can be provided by residents trained locally and inexpensively. (DP-E)

3906 Ferrell, M.E. USA, Department of Health, Education, and Welfare. *Nutrition awareness.* Tucson, Arizona, Indian Health Service, Desert Willow Training Center, Jun 1977. 1v.(unpaged). Engl.
Unpublished document; see also entries 3591,

3592, 3833, 3902, 3903, 3918, 3921, 3922, 3923, 3930, 3931, 3932, 3933, 3934, 3935, 4032, 4050, 4051, 4085, and 4100.

This 2-week course is designed to introduce US Indian Health Service community health representatives (CHRs) whose major field of interest or activity is nutrition to: food habits, their origins and impact; basic nutrition and the life cycle; the role of nutrition in health; and food selection and preparation. This document outlines course prerequisites, content, teaching methodology, instructional aids (books and films), performance objectives, and student evaluation criteria. (HC-L)

3907 Fine, L.L., Scriven, S.S. *Child health associate: a nonphysician primary care practitioner for children.* P.A. Journal (Washington, D.C.), 7(3), Fall 1977, 137-142. Engl. 20 refs.

The child health associate (CHA) is the graduate of a 3-year programme offered by the University of Colorado School of Medicine (USA). The programme consists of: 1 year basic science, with emphasis on its application to ambulatory pediatrics; 1 year clinical practice in pediatric wards, nurseries, well-child clinics, etc.; and 1 year internship in an ambulatory setting. Previous studies of CHAs have shown that their history-taking and physical examination skills and their performance on basic science examinations are comparable to those of medical students and that they can diagnose the problems of ambulatory pediatric patients with an accuracy comparable to that of practicing pediatricians. A study of the quantitative aspects of the care delivered by a CHA at a child/youth project in Wyoming was undertaken over a 12-month period. The CHA was asked to complete a patient contact record for each child seen, indicating the patient's age, reason for visit, length of visit, diagnosis, and whether a physician consultation was required. Analysis of the data revealed that, during the 12-month period, the CHA provided care for 1 744 patients aged 2 weeks-10 years at the rate of eight per half-day, that the average time spent per patient was 16.2 minutes, that 52% of the patient visits were for acute medical problems and 47% were for well-child care, that 258 medical problems were diagnosed in the 806 children seen for well-child care, and that the CHA was able to provide care for 90.8% of the patients without direct physician consultation. It is concluded that competent nonphysicians have the potential to deliver a major portion of the primary care required by children. (HC-L)

3908 Gachoud, P. *Promoteur de sante: medecin aux pieds nus de la Cordillere des Andes. (Health promoter: barefoot doctor in the Andean Mountains).* Revue Medicale de la Suisse Romande (Lausanne, Switzerland), 97(7), Jul 1977, 361-364. Fren. 10 refs.

A programme for training indigenous health promoters was begun in the highlands of Peru because of the refusal of health professionals to serve in such an isolated area. The health promoter is a volunteer aged 20-30 years, a permanent resident in the community, literate, and fluent in both Spanish and the local language. In a

2-3 week course in a local health centre, he is taught the rudiments of anatomy and physiology, the administration of various medicines, the symptoms of prevalent diseases, and the technique of injection. Upon completion of the course, the promoter is provided with a reference manual containing the indications and dosages of the medicines he is allowed to prescribe plus other information covered in the basic courses. Thereafter, the promoter returns to the health centre once a month in order to discuss his work with the doctor and to enlarge his knowledge and increase his skills. The promoters have so far proved indispensable, especially in the implementation of vaccination and anti-tuberculosis campaigns. At the time of writing, most communities in the province of Carabaya had a health promoter who had become a well-respected member of the community; health promoters had received official recognition and were on the point of receiving state remuneration. Some information on the economic status, health resources, and epidemiology of the region is included. (HC-L)

- 3909 Garcia, J.S.** *Auxiliary health worker in community health.* Tropical Doctor (London), 8(2), Apr 1978, 90-94. Engl.

Based on the experience gained from past failures to maintain permanent outpatient services in rural areas, the Extension Service of the Silliman University Medical Centre in Dumaguette City, the Philippines, has developed a more effective programme of community health involving social participation and self-help. Key elements are a survey of the needs of the community, organization of parent and youth clubs, construction and administration of health centres, and training of local auxiliary health workers. The responsibilities of these community health workers include treatment of simple wounds and illnesses, vaccinations, family planning, records maintenance, home visits, etc. Ideally, the community would be able to support the programme financially after the initial period. (FM)

- 3910 Gelfand, M.** *Health care for Africans in Rhodesia.* Central African Journal of Medicine (Salisbury), 22(12), Dec 1976, 252-257. Engl.

Since 1936, various categories of auxiliary personnel have been trained to meet the needs of Rhodesia's rural population. The earliest of these included: the medical assistant, an individual trained in nursing and the recognition and treatment of common ailments; the microscopist, a medical assistant with additional training in microscopic diagnosis; and the assistant midwife, the graduate of a 2-year course in midwifery. A later addition was the hygiene demonstrator, who assumed responsibility for preventive medicine. This paper describes the evaluation and functions of these primary care personnel and the infrastructure within which they operate; it also discusses the future direction of the rural health services. (HC-L)

- 3911 Harrison, P.** *Salud de la comunidad en el Peru. (Community health in Peru).* Salud Mundial (Geneva), Aug-Sep 1977, 18-24. Span.

Also published in Arabic, English, French, German, Italian, Persian, Portuguese, and Russian.

In the Peruvian Andes, infant mortality often reaches 50% and the most common causes of death are pneumonia, whooping cough, and tuberculosis, as opposed to gastrointestinal infections in the tropics. Health care delivery is complicated by the inaccessibility of the scattered population, their poverty and language difficulties, and the refusal of health professionals to practice under such arduous conditions. In 1975, with the help of WHO and UNICEF, the Peruvian government initiated a 3-year programme to increase health services coverage by 25%, thus reaching some 40% of the inhabitants of the Andean region. Local villagers were encouraged to form nutrition committees and to elect one of their number to be trained by the government as a health auxiliary. Each village is entirely responsible for the support of its health worker and for the construction of a rural health post from which he can operate. The health auxiliaries provide health education and first aid, monitor child health and pregnancies, deliver babies, prescribe medicines, coordinate local environmental health activities, and refer complicated cases to local health centres. The situation and functions of a typical health worker are described. (RMB)

- 3912 Huenuman, F.** *Mi tierra, mi pueblo (mi gente), mi mision; un auxiliar de salud de una pequena comunidad de Chile relata como las ceremonias religiosas tradicionales fueron dando paso a la medicina moderna. (My country, my people, my mission; an auxiliary health worker in a small Chilean community describes how traditional religious ceremonies have given way to modern medicine).* Salud Mundial (Geneva), Aug-Sep 1977, 14-17. Span.

Also published in Arabic, English, French, German, Italian, Persian, Portuguese, and Russian.

In 1974, a woman from an isolated mountain village in Chile was selected to undergo 8 months training as an auxiliary health worker; today, she provides 1 800 people with preventive medicine, instruction in hygiene and nutrition, and a point of entry to the nearest hospital. The auxiliary briefly describes the village's way of life, its traditional beliefs regarding ill health, and her work, which has resulted in a childhood mortality reduction of 8%. (HC-L)

- 3913 Huenuman, F.** *Change comes to Casa de Piedra; a health worker in a remote village tells how old rituals gave way to modern medicine.* Health (Washington, D.C.), 9(3), 1977, 4-7. Engl.

This 1st-person account of an auxiliary health worker in a rural mountain village in Chile describes his break with the traditional ceremonies performed by local witches when he took an 8-month training course sponsored by the national health service. He now mans the first-aid post, supervises school hygiene, makes hospital referrals and provides health education in environmental health, disease control, and nutrition. (RMB)

- 3914 Kane, R.L., ed(s).** John E. Fogarty International Center for Advanced Study in the Health Sciences, Bethesda, Md. Association of Teachers of Preventive Medicine, University of Colorado Medical Center, Denver, Col. *New health practitioners*. Washington, D.C., Department of Health, Education, and Welfare, Public Health Service, DHEW Publication No.(NIH)75-785, Fogarty International Center Series on the Teaching of Preventive Medicine, 1975. 156p. Engl. Refs.
Conference on New Health Practitioners, Bethesda, Md., 14-15 May 1974.

The papers presented at this workshop examine the role of new health practitioners, mainly nurse practitioners and physician assistants, in preventive and community medicine in the USA. Topics covered include: the development of the nurse practitioner movement and its suitability to a health- rather than a disease-oriented model of health care delivery; the demand for new health practitioners and implications for the future; the concept and reality of the health care team; the potential role of departments of preventive medicine *vis-a-vis* new health practitioners and new health care delivery models; the training of new health practitioners (curriculum content, site of training, complementary training for physicians, etc.); the evaluation of their training and their impact on the health system; the provision of preventive services by new health practitioners, present and future; the deployment and supervision of new health practitioners; and their registration, certification, and licensure. A list of 21 recommendations, approved by the majority of the working participants, is included. The editor hopes that some of the issues presented may be of interest to legislators and administrators seeking this sort of solution to the problems of health care delivery. (HC-L)

- 3915 Kidd, C.** *Community health aide training programme*. In *Alternatives in the Delivery of Health Services*, Mona, Jamaica, University of the West Indies, Department of Social and Preventive Medicine, 1976, 39-44. Engl.
Seminar/Workshop on Alternatives in the Delivery of Health Services, Castries, St. Lucia, 8-12 Nov 1976.
For complete document see entry 3012 (volume 5).

In 1972, the Jamaican Ministry of Health and Environmental Control began training community health aides (CHAs). The training programme was designed to enable CHAs to work with families in the area of basic health care and assist professionals in clinics. The CHAs are trained for 8 weeks in their home parishes in groups of 25 by public health nurses and nutrition, health education, and family planning officers. Frequent tests are administered to determine whether trainees are absorbing the material in the extensive curriculum. By May 1976, 1 029 CHAs were in service in Jamaica. (DP-E)

- 3916 Kurup, P.N.** *Science of life*. World Health (Geneva), Nov 1977, 13-15. Engl.

Also published in Arabic, French, German, Italian, Persian, Portuguese, Russian, and Spanish.

The author describes some traditional medical systems with special emphasis on Ayurveda, of which there are some 500 000 practitioners in India, many of whom received formal training in one of the 115 recognized institutions. To integrate this and other traditional systems into a national health care programme, the competence of their practitioners must be assessed. Appropriate training could then be offered to different categories of traditional practitioners, who could probably treat more than 80% of rural health problems with inexpensive local remedies. (RMB)

- 3917 Langmuir, S.** *Barefoot doctors and health care in China*. Journal of Allied Health (Thorofare, N.J.), 5(3), Summer 1976, 9-13. Engl. 9 refs.

The selection, training, and role of the barefoot doctor in China is discussed. Chosen from and by the community, the barefoot doctor undergoes a relatively short training period emphasizing clinical skills related to the needs of his area. He is part of a network of health services consisting of mobile teams of professional doctors and nurses, brigade clinics, and commune hospitals. As well as holding daily clinics, barefoot doctors participate in the work of the brigade and regularly return to larger hospitals for continuing education. Urban health care is organized in a similar way with worker doctors chosen from among factory workers. (FM)

- 3918 Myhre, R.D.** USA, Department of Health, Education, and Welfare. *Community health representative program; a unique concept for provision of health service to Indian people*. Seattle, Wash., Indian Health Service, Puget Sound Service Unit, 1970. 7p. Engl.
Unpublished document; see also entries 3591, 3592, 3833, 3902, 3903, 3906, 3921, 3922, 3923, 3930, 3931, 3932, 3933, 3934, 3935, 4032, 4050, 4051, 4085, and 4100.

The US Community Health Representative Program was developed to bridge the gap between Indians and available, but poorly utilized, health services. The community health representative (CHR) is an individual chosen and employed by his tribe according to a contract and protocol drawn up in conjunction with the health services. The CHR's training is aimed at producing an individual who can diagnose and refer rather than a medical technician. It consists of: 4 weeks training at a national training centre in Arizona; 2-6 weeks individualized training, planned by the tribe and implemented by training centre staff and local health workers, on home ground; and continuing education by local health workers thereafter. This paper briefly describes the core curriculum, the teaching methodology, and the programme's administration. (HC-L)

- 3919 New, P.K., New, M.L.** *China's barefoot doctors; health care by and for the people.* Dartmouth Alumni Magazine (Dartmouth, N.S.), 66, Jun 1974, 22-25. Engl.

This paper briefly describes the historical origins, training, and functions of barefoot doctors in the People's Republic of China and discusses the ideological, social, and administrative factors that made their deployment possible. Among these are the adoption of both Chinese and Western techniques, the integration of theory and practice in education, the relaxation of licensing requirements, the philosophy of service to the people, and the decentralization of health care administration and health insurance. A few statistics on crude birth and death rates are included as indicators of advancement in the area of public health. (HC-L)

- 3920 Ram, E., and Stromberg, J., and Hilton, D., ed(s).** *Services de sante en milieu rural a la maniere de Lardin Gabas. (Rural health services in the Lardin Gabas manner).* Contact (Geneva), (32), Nov 1977, 1-8. Fren.

A method of health promotion that relies on the active participation of the target population is presently underway in Lardin Gabas, Nigeria. The programme has three innovative characteristics: the training costs, traveling expenses, supplies, and salaries of locally chosen village workers are borne by the villagers themselves; the work of the village health workers is supervised by the village health committee, local inhabitants who are also responsible for the construction and furnishing of a village health post; and both the training of health workers and the education of villagers are conducted in the local language and the local mode of expression, the parable. After 3-months training, the village health worker assumes responsibility for maternal child health, well-child clinics, malnutrition case-finding, malaria prophylaxis, health education, and referral. So far the programme has been enthusiastically received and supported by the villagers and has been adopted by the federal government as a model for the future system of basic health services. A formal evaluation was to have commenced near the end of 1977. (HC-L)

- 3921 Roebuck, H.** USA, Department of Health, Education, and Welfare. *Workshop on family planning.* Tucson, Arizona, Indian Health Service, Desert Willow Training Center, 28 Feb 1978. 3p. Engl.

Unpublished document; see also entries 3591, 3592, 3833, 3902, 3903, 3906, 3918, 3922, 3923, 3930, 3931, 3932, 3933, 3934, 3935, 4032, 4050, 4051, 4085, and 4100.

A 3-day workshop on family planning is to be made available upon request to US Indian Health Service community health representatives (CHRs) in the field. The course teaches the student to discuss the goals and issues of family planning, to explain the structure and function of the male and female reproductive systems, to describe the contraceptive methods currently in use, and to identify the conditions that indicate a need for family planning services and referral resources in the

community. This document outlines course content, objectives, and prerequisites. (HC-L)

- 3922 Rund, N.H., Myhre, R.D., Fuchs, M.** USA, Department of Health, Education, and Welfare, Office of Program Development, Indian Health Service. *Community health representative; a changing philosophy of Indian involvement.* Washington, D.C., US Government Printing Office, Feb 1970. 12p. Engl.

Unpublished document; see also entries 3591, 3592, 3833, 3902, 3903, 3906, 3918, 3921, 3923, 3930, 3931, 3932, 3933, 3934, 3935, 4032, 4050, 4051, 4085, and 4100.

The community health representative (CHR) programme was developed to involve US Indians in the identification and solution of their own health problems; it is unique in that, although funded by the US Indian Health Service, each tribe designs and administers its own programme, negotiates its own contract, and selects its own CHRs. This document describes the four basic types of programmes that have been developed by the tribes, the training curriculum and methodology for CHRs, the results of a survey of attitudes towards and expectations of the programme on the part of Indians and Indian Health Service employees prior to its implementation, and the positive and negative aspects of the programme after 1 year of operation. (HC-L)

- 3923 Sampson, P., Gunby, P.** *Health representative: a new tribal role.* Journal of the American Medical Association (Chicago, Ill.), 218(5), 1 Nov 1971, 665-667. Engl.

See also entries 3591, 3592, 3833, 3902, 3903, 3906, 3918, 3921, 3922, 3930, 3931, 3932, 3933, 3934, 3935, 4032, 4050, 4051, 4035, and 4100.

Community health representatives (CHRs) are recruited and employed by tribes and trained by the US Indian Health Service in a 1-month course covering disease control, environmental health, mental health, alcoholism, drug abuse, and suicide. They also learn how to deal with tribal and government administrators. Some 400 CHRs serve their communities on reservations in 23 states as case-finders and educators and as a link between patients and the established system. (DP-E)

- 3924 Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia.** Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; reclutamiento y seleccion de promotoras rurales de salud. (Rural health services system; recruiting and selecting rural health promoters).* Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 1v.(various pagings). Span.

See also entries 3670, 3678, 3843, 3901, 4019, 4020, 4021, 4022, 4023, 4024, 4025, 4026, and 4030.

This document sets forward a number of criteria for selecting rural health promoters. Factors such as age, education, leadership ability, location of residence, stability, availability during non-working hours, experience, etc., are discussed and recommended procedures for soliciting applications and conducting interviews are outlined. Forms to be used throughout the process are appended. (HC-L)

- 3925 Standard, K.L., Ennever, O.** *Training of health auxiliaries in the West Indies.* Educacion Medica y Salud (Washington, D.C.), 9(3), 1975, 285-295. Engl.

In 1967, the University of the West Indies (Jamaica) sponsored an experimental programme to train community health workers to work as part of a health team under professional supervision. After 4 weeks training in hygiene, basic nursing procedures, public health, human relationships, the structure and resources of the community, basic English, and the role of the community health aide, 8 of the original 11 trainees were selected for an additional 3 months training in these areas, including practical experience in a hospital. After training, community health aides in health centres act as receptionists and chaperones, take temperatures, test urine, weigh and measure children and adults, do simple dressings, maintain medical records, etc.; in the field they check on broken appointments, assist with home care of the ill and aged (bed baths, care of pressure areas, temperature-taking), and prepare and demonstrate meals for children and invalids. Due to the success of the initial programme, a 2nd programme with emphasis on child health and nutrition was implemented to train 6 community health aides in a remote rural community. An additional 375 aides were trained in two later programmes. (RMB)

- 3926 Subbiah, S.** *Health education and training of leprosy field workers.* Leprosy in India (New Delhi), 49(3), Jul 1977, 414-418. Engl.

An 8-week course was held in the Gandhigram Institute of Rural Health and Family Planning, India, to help leprosy workers acquire the skills needed to identify local leaders and work with them in organizing a community leprosy control/education programme. The course was well received by the leprosy workers; in the villages where its methods were applied, improvement in the villagers' knowledge regarding leprosy was noted and increases in the numbers of persons coming forward for examination and attending leprosy clinics were evident. (HC-L)

- 3927 Suharjono.** *Role of the University of Indonesia in overcoming diarrhoeal diseases in rural health centres.* Paediatrica Indonesiana (Jakarta), 17(7-8), Jul-Aug 1977, 239-245. Engl.
Follow-on Meeting, WHO Course for Senior Teachers of Child Health, New Delhi, India, 16 Oct 1975.

The author discusses the teaching of community pediatrics to medical school students and outlines practical guidelines for the management of infant diarrhea and

dehydration that can be taught to auxiliary health workers. He emphasizes that all fluid losses should be replaced, thirsty children should be encouraged to drink, and properly hydrated children have palpable pulses and pass urine every 2-4 hours. Auxiliaries should also learn that 70%-90% of diarrheal episodes can be resolved with 24-48 hours of fluid replacement, fever is an important sign of underlying infection, and malnutrition can be a cause of diarrhea. Experience will soon reinforce these principles. (RMB)

- 3928 Tborburn, M.J.** *Training community workers to meet the needs of pre-school handicapped children.* In Alternatives in the Delivery of Health Services, Mona, Jamaica, University of the West Indies, Department of Social and Preventive Medicine, 1976, 20-27. Engl.

Seminar/Workshop on Alternatives in the Delivery of Health Services, Castries, St. Lucia, 8-12 Nov 1976.

For complete document see entry 3012 (volume 5).

The Jamaica Council for the Handicapped has developed a well-received programme, the Early Stimulation Project, to provide handicapped children with some of the skills needed to reach their maximum potential and ability. National Youth Service workers have been trained to use the Denver Developmental Screening Test to assess a child's development. Where necessary, a child development aid (CDA), trained under the Special Employment Programme (SEP), works with the child and its mother, demonstrating to the mother the skills that the mother must teach the child. The CDA visits the home weekly to check the child's progress and give advice on family planning, nutrition, immunization, etc. (DP-E)

- 3929 Udupa, K.N.** *Ayurvedic training.* World Health (Geneva), Nov 1977, 15. Engl.

Also published in Arabic, French, German, Italian, Persian, Portuguese, Russian, and Spanish.

Ayurveda, the traditional medicine of India that has been in existence for some 4 000 years, has been taught in special colleges for over a century. The admission requirements, duration of the course, and internship are similar to those of Western medical schools; the undergraduate and specialty curricula are described. A Doctorate of Ayurvedic Medicine is now awarded after training in both traditional and Western disciplines. The author feels that trained Ayurvedic and Western doctors could be complementary to one another and that they should be encouraged to cooperate. (RMB)

- 3930 USA, Department of Health, Education, and Welfare.** *Workshop on disease prevention.* Tucson, Arizona, Indian Health Service, Desert Willow Training Center, 31 Mar 1978. 3p. Engl.
Unpublished document; see also entries 3591, 3592, 3833, 3902, 3903, 3906, 3918, 3921, 3922, 3923, 3931, 3932, 3933, 3934, 3935, 4032, 4050, 4051, 4085, and 4100.

A 2-5-day workshop on disease prevention for US Indian Health Service community health representatives (CHRs) covers preventable and nonpreventable disease, patterns of behaviour (habits) and preventable disease, behaviour modification, and the development of a plan of action for preventive health services. This paper contains an outline of the workshop's content. (HC-L)

3931 USA, Department of Health, Education, and Welfare. *Environmental health concepts and practices.* Tucson, Arizona, Indian Health Service, Desert Willow Training Center, Sep 1977. 12p. Engl.

Unpublished document; see also entries 3591, 3592, 3833, 3902, 3903, 3906, 3918, 3921, 3922, 3923, 3930, 3932, 3933, 3934, 3935, 4032, 4050, 4051, 4085, and 4100.

A 2-week course has been designed to help US Indian Health Service community health representatives (CHRs) develop an awareness of the environment and its effect on human health and acquire some basic environmental skills. The course covers: arithmetic; microbiology; water supply and waste disposal sanitation; zoonoses and vector-borne diseases; prevention and control of food-borne diseases; accident prevention and injury control; housing, recreation, and public building sanitation; and report-writing. This document outlines course content, teaching methodology, instructional aids, and criteria for student evaluation and gives very detailed performance objectives. (HC-L)

3932 USA, Department of Health, Education, and Welfare. *Rehabilitation and home health care.* Tucson, Arizona, Indian Health Service, Desert Willow Training Center, Jun 1977. 5p. Engl.

Unpublished document; see also entries 3591, 3592, 3833, 3902, 3903, 3906, 3918, 3921, 3922, 3923, 3930, 3931, 3933, 3934, 3935, 4032, 4050, 4051, 4085, and 4100.

A 2-week course has been designed to acquaint US Indian Health Service community health representatives (CHRs) with the basics of home health care and rehabilitation. This document outlines course prerequisites, content, teaching methodology, instructional aids, performance objectives, and criteria for satisfactory completion. (HC-L)

3933 USA, Department of Health, Education, and Welfare. *Introduction to human services.* Tucson, Arizona, Indian Health Service, Desert Willow Training Center, May 1977. 6p. Engl.

Unpublished document; see also entries 3591, 3592, 3833, 3902, 3903, 3906, 3918, 3921, 3922, 3923, 3930, 3931, 3932, 3934, 3935, 4032, 4050, 4051, 4085, and 4100.

This 76-hour course for US Indian Health Service community health representatives (CHRs) improves their understanding of the roles and relationships in the social services and polishes communication, planning, and problem-solving skills. This document outlines course

prerequisites, content, teaching methodology, instructional aids, performance objectives, and criteria for student evaluation. (HC-L)

3934 USA, Department of Health, Education, and Welfare. *Basic maternal and child health.* Tucson, Arizona, Indian Health Service, Desert Willow Training Center, Feb 1977. 1v.(unpaged). Engl.

Unpublished document; see also entries 3591, 3592, 3833, 3902, 3903, 3906, 3918, 3921, 3922, 3923, 3930, 3931, 3932, 3933, 3935, 4032, 4050, 5051, 4085, and 4100.

A 10-day course has been designed to teach US Indian Health Service community health representatives (CHRs) basic knowledge about the child-bearing cycle, family-centered maternity care, and the health needs of infants and children; they also gain practical experience in taking anthropometric measurements and screening schoolchildren. This document outlines course prerequisites, content, teaching methodology, instructional aids, performance objectives, and criteria for satisfactory completion. (HC-L)

3935 USA, Department of Health, Education, and Welfare. *C.H.R. Program information digest: Project MASTA.* Tucson, Arizona, Indian Health Service, Desert Willow Training Centre, Jan 1974. 1v.(unpaged). Engl. 19 refs.

Unpublished document; see also entries 3591, 3592, 3833, 3902, 3903, 3906, 3918, 3921, 3922, 3923, 3930, 3931, 3932, 3933, 3934, 3935, 4032, 4050, 4051, 4085, and 4100.

This 1973 review of the accomplishments of the Community Health Representative (CHR) Program lists the inservice training courses available to CHRs, statistical data on the characteristics and turnover rates of CHRs, the names and addresses of CHR programme coordinators, and a bibliography on this and other US auxiliary health worker programmes. It is noted that, since the inception of the programme in 1968, CHRs have increased their activity in the community and their participation in community health planning and that the community, in turn, has shown better understanding of the role of the CHR and increased interest in health improvements. (HC-L)

3936 Viau Davila, A. *Academia de Ciencias Medicas, Fisicas y Naturales de Guatemala, Guatemala. Monografia sobre el desarrollo del programa de salud rural de Guatemala; estudio de factibilidad para el adiestramiento del tecnico de salud rural, epoca de ejecucion: diciembre 1969 a mayo de 1971. (Monograph on the development of a rural health programme for Guatemala; feasibility study of the training of rural health technicians, December 1969-May 1971).* Guatemala City, Academia de Ciencias Medicas, Fisicas y Naturales de Guatemala, Mar 1976. 135p. Span. 58 refs.

This monograph presents the results of a study to determine the feasibility of training middle-level health workers or medical assistants, called health technicians, for deployment in Guatemala. The study focuses on the characteristics of the rural health situation that justify the creation of this type of auxiliary, such as morbidity and mortality patterns, availability of health resources, functions of rural health centres, etc., and seeks to determine the most appropriate entrance requirements, training programme, training centre, teachers, and role for such a worker. The study methodology is described in great detail in the hope that it will provide health planners in other countries with a model for evaluating their auxiliary health personnel. (HC-L)

- 3937 Viau Davila, A. *Alternatives to the traditional medical education in Guatemala*. n.p., n.d. 16p. Engl.**

Unpublished document.

In Guatemala, the rural health technician (TSR) is responsible for community health education, communication between the village and the health care system, and a limited number of clinical duties under the supervision of a physician. The TSR in turn supervises rural health promoters and traditional midwives. TSRs are chosen from applicants with at least 3 years of prevocational education and trained for 2 years. Their success demonstrates the need for the elaboration of a national health plan and a new approach to physician education. The author discusses the implications for national health policy and physician training and attitudes. (RMB)

- 3938 Viau Davila, A., Gomez Duarte, C.E., Cabrera Meza, L. *Suplementos a la II parte del informe final: monografia sobre el desarrollo del programa de salud rural en Guatemala; III parte del informe final, anexo "B"*. (Supplement to Part II of the final report: monograph on the development of the Guatemalan rural health programme; part III of the final report, annex "B").** Guatemala City, Academia de Ciencias Medicas, Fisicas, y Naturales, n.d. lv.(various pagings). Span.

Seminario sobre el Desarrollo de una Metodologia para el Adiestramiento de Auxiliares en Salud, Guatemala City, Guatemala, 16-23 May 1976.

See also entries 3748, 3939, and 3940.

Previously-published papers relevant to the development of Guatemala's rural health programme and, in particular, its auxiliary training component have been compiled in this document. Topics covered include elaboration of training objectives for health personnel, the rural health technician's curriculum, a training laboratory for teachers of rural health technicians, student selection, and student evaluation. Other papers deal with miscellaneous topics such as: the use of simulation models in health planning; planning, programming, and budgeting; a strategy for evaluating health projects; the organization of a model health service in El Quiche; etc. (HC-L)

- 3939 Viau Davila, A. *Informe final, I parte. (Final report, part I)*.** Guatemala City, Academia de Ciencias Medicas, Fisicas y Naturales, n.d. lv.(various pagings). Span.

Seminario sobre el Desarrollo de una Metodologia para el Adiestramiento de Auxiliares en Salud, Guatemala City, Guatemala, 16-23 May 1976.

See also entries 3748, 3938, and 3939.

A seminar for Guatemalan auxiliary health workers and those involved in their training and deployment was held to discuss current methodology for training rural health technicians, examine an alternative training methodology that is based on occupational analysis, explain the information and evaluation system developed for use in the rural health programme, and discuss some techniques for identifying programme alternatives. Also, to enhance communications between the participants, a number of workshops on human relations were included. This document describes the background, agenda, and working methodology of the seminar; exercises and questionnaires used in the workshops on human relations are reproduced in the annexes. (HC-L)

- 3940 Viau Davila, A., Gomez Duarte, C.E. *Suplementos a la II parte del informe final: monografia sobre el desarrollo del programa de salud rural en Guatemala; III parte del informe final, anexo "A"*. (Supplement to part II of the final report: monograph on the development of the Guatemalan rural health programme; part III of the final report, annex "A").** Guatemala City, Academia de Ciencias Medicas, Fisicas y Naturales, n.d. lv.(various pagings). Span. Refs.

Seminario sobre el Desarrollo de una Metodologia para el Adiestramiento de Auxiliares en Salud, Guatemala City, Guatemala, 16-23 May 1976.

See also entries 3748, 3938, and 3940.

This supplement contains a number of previously-published papers relevant to the development of Guatemala's rural health programme and, in particular, its auxiliary training component. Topics covered include: systems analysis applied to auxiliary training (a glossary of terms is included); the systems approach to administration; a diagnostic summary of the health situation in Guatemala; the health team concept; task and functional analysis in the rural health centre and post (sample forms for gathering data and formulating job descriptions are included); the process, laws, principles, and methods of teaching/learning categories of auxiliaries; and the use of numerical taxonomy in the classification of auxiliary health workers. (HC-L)

IV.2 Primary Nursing Care

IV.2.1 Professional

See also: 3519, 3522, 3532, 3827, 3828, 3831, 3856, 3910, 3914, 3978, 3993, 4031, 4047, 4115

- 3941 Baez, M.C.** *Enfermería y nutrición en los servicios de salud. (Nursing and nutrition in the health services).* Boletín de la Oficina Sanitaria Panamericana (Washington, D.C.), 81(5), Nov 1976, 395-398. Span. 10 refs.

In Central America, nutrition activities have generally been carried out by the nursing profession. Now that these activities, along with health services in general, are to be extended to the entire population, it is suggested that nurses be called upon to take an active role in the planning, elaboration, implementation, and evaluation of nutrition programmes at all levels of the health services and that their responsibilities *vis-a-vis* nutrition be formally recognized, defined, and incorporated into their training programmes. This would eliminate the need for unipurpose nutrition workers — in any case, an uneconomic alternative — and ensure that nutrition is presented as an integral part of the basic health services. (HC-L)

- 3942 Bailon, S.G., Maglaya, A.S.** *Tools and guidelines for nursing care at the family level; part I: a typology of nursing problems in family care practice.* Anphi Papers (Quezon City, Philippines), 12(1), Jan-Mar 1977, 13-21. Engl. 8 refs.

A classification of the problems encountered in community nursing practice has long been considered desirable as a means of encouraging communication between nurses and other health professionals, improving the nursing record system, establishing job descriptions and determining necessary skills, providing a framework for the nursing curriculum, and encouraging the development of a criteria for nursing evaluation. The authors have drawn up one such classification system based on their experience as practitioners and teachers of community nursing. First of all, they assume that the primary function of the nurse is to develop or strengthen the family's ability to perform certain health tasks. In order to do this, she must be able to recognize the presence of a number of specific health threats, health deficits, or predictable crises in the family. Each of these problems is discussed in detail. Student nurses who tested the typology in the field reported that it fostered a more organized and systematic diagnostic system, enabled them to express nursing problems in terms other than descriptions or medical diagnoses, and helped them view and assess the family as an interacting unit. Readers are invited to test and evaluate the typology for themselves. (HC-L)

- 3943 Children in the Tropics, Paris.** *What the health personnel must know in order to shape and supervise a primary health care programme.* Children in the Tropics (Paris), (108-109), 1977, 38-41. Engl.

In order to shape and supervise a primary health care programme, the nurse of a health station must learn to communicate with the villagers on their own terms. This enables her to learn the villagers' concerns and discover how they perceive and treat various illnesses. The nurse must be prepared to teach health agents who are less articulate, literate, and technically knowledgeable than

she. It is also necessary to supervise agents through regular visits and to ensure drug supplies. (DP-E)

- 3944 Copp, L.A.** *Waiting room: a health teaching site.* Nursing Outlook (New York), 19(7), Jul 1971, 481-483. Engl.

Despite lack of time and possible criticism from other health workers, nurses should be more aware of their role in health education and try to take advantage of every opportunity to impart knowledge of health care to patients and their families. Waiting rooms, admission areas, recovery rooms, emergency departments, and maternity wards can become learning sites for patients anxious for information about their conditions. Possible teaching aids include closed circuit television, slides, movies, cassette tapes, and printed materials. (DP-E)

- 3945 Garfield, R.** *Nursing and health care in China.* Nursing Forum (Chicago, Ill.), 26(3-4), 1977, 329-339. Engl. 13 refs.

Innovations in nursing services in the People's Republic of China have upgraded the training and status of nurses and reduced the traditional differences between doctors and nurses. All medical personnel are encouraged to have a basic understanding of common health problems and to participate equally in all aspects of patient care. Job classifications are not as strictly defined as in the USA, nor are wage differences as great. Flexibility is also evident in nurse-patient relationships where self-care is encouraged. Staff organization and administration are characterized by cooperation and the involvement of all members of each health care unit. (FM)

- 3946 Hay, I.** *Experience with the nurse practitioner in family practice (based on the Burlington randomized control trial of the nurse practitioner).* In Alternatives in the Delivery of Health Services, Mona, Jamaica, University of the West Indies, Department of Social and Preventive Medicine, 1976, 129-143. Engl.

Seminar/Workshop on Alternatives in the Delivery of Health Services, Castries, St. Lucia, 8-12 Nov 1976.

For complete document see entry 3012 (volume 5).

A family practice in Burlington, Ontario, Canada, a small suburban city of 100 000, trained and employed a nurse practitioner to work as a co-practitioner with the family doctor who would take the ultimate responsibility for her work. The experiment lasted for 4 years with expansions and modifications made periodically. Comparisons with other practices indicated that a number of significant benefits had occurred. More patients were receiving care at less cost and the physician was able to better allocate his time. On the negative side, the physician was forced to assume responsibility for more patients and there was a corresponding increase in paperwork and administrative duties. Statistical data are included. (DP-E)

- 3947 Kenya Nursing Journal, Nairobi.** Reports presented at the seminar hosted by National Nurses Association of Kenya to celebrate "10 years of nursing in Kenya." Kenya Nursing Journal (Nairobi), 6(1), Mar 1977, 49-58. Engl.

These papers recount the progress achieved and the problems encountered during the development over the past 10 years of the following nursing activities in Kenya: training programmes for enrolled, registered, and community nurses; midwifery education and services; psychiatric nursing; and advanced nurse training. Some statistical data regarding the production of nursing manpower during this period is presented and the future of nursing in Kenya is briefly discussed. (HC-L)

- 3948 Manickam, A.E., Chia, M., Liew, C.B., Ng, K.C.** *Nursing Management Project at the Toa Payoh Hospital, Singapore; phase I: participative management.* Nursing Journal of Singapore (Singapore), 16(1), May 1976, 4-9. Engl.

The Nursing Management Project (phase I) at the Toa Payoh Hospital, Singapore, was undertaken to promote better utilization of resources and personnel in the hospital and provide certain key nursing personnel with an opportunity to develop their self-confidence and administrative and managerial skills. Under the direction of a planning committee, five teams of nursing officers (32 in all) were assigned a series of problems that they were to investigate and solve. A sample work format, which defined seven steps in identifying and analyzing factors related to a problem area, was given to each team coordinator to serve as a guideline and each team had approximately 3 months to complete its work. During the same period, the nurses were exposed to various managerial, organizational, and human relations techniques. The nursing officers expressed great satisfaction in being directly involved in solving their own problems and the implementation of their recommendations resulted in a number of improvements in the hospital's administrative and support services. They also expressed a willingness to participate in phase 2 of the project, which will be concerned with upgrading the quality of nursing services in the hospital. (HC-L)

- 3949 Moustafa, K., Bennett, M.** *Hope for community health nursing in Egypt.* Journal of the Egyptian Public Health Association (Cairo), 52(2), 1977, 87-92. Engl.

Professional nurses in Egypt have, to date, played a limited role in rural and community health. A strategy has therefore been devised to interest them in this area and extend their efforts through appropriately-trained auxiliaries. The High Institute of Nursing, Cairo, has adopted a maternal and child health centre as a demonstration unit where undergraduate nurses obtain clinical experience as members of the health team and assist in evaluating and devising appropriate ongoing training for the midwives and assistant midwives employed there. If the strategy proves successful in the demonstration unit, it is to be extended to maternal child health clinics throughout the country. (HC-L)

- 3950 Pacifico, P.B.** *Dynamic and expanded roles of nurses in community health nursing.* Philippine Journal of Nursing (Manila), 46(2), Apr-Jun 1978, 86. Engl.

Fifty-fourth Annual Convention of the Philippine Nurses Association, Manila, Philippines, 16 May 1977.

The author foresees an expanded, more challenging role for community health nurses in the Philippines. As part of a health team, they will share more responsibility for implementing and evaluating health programmes. Therefore, greater attention must be given to training such nurse-practitioners. The existing infrastructure of midwives in the *barangay* health clinics is an example of the increased responsibility of the public health nurse, who must oversee their administration and management. (FM)

- 3951 Ross, W.F.** *Advanced clinical nurse (ACN) and the health team.* Rhodesian Nurse (Salisbury), 8(2), Jun 1976, 7-8. Engl.

In 1976, faced with a shortage of medical practitioners in the rural areas, Rhodesia launched a programme to train advanced clinical nurses (ACNs). The 2-year, hospital-based course covers community medicine, obstetrics, family planning, anaesthetics, and clinical surgery. Upon successful completion of training, the ACN will assist physicians in running a hospital or staff rural hospitals where doctors visit on a regular basis. The ACN will perform many functions presently undertaken by the physician and in many cases will be responsible for community medicine programmes. (DP-E)

- 3952 Vandervlist, I.** *Role of the nurse practitioner; Kitchener/Waterloo General Hospital.* In Alternatives in the Delivery of Health Services, Mona, Jamaica, University of the West Indies, Department of Social and Preventive Medicine, 1976, 144-156. Engl.

Seminar/Workshop on Alternatives in the Delivery of Health Services, Castries, St. Lucia, 8-12 Nov 1976.

For complete document see entry 3012 (volume 5).

A Canadian pilot project to train nurse-practitioners is described. A 1-year work-study course covering interviewing and history-taking technique, physical examinations, child and family health, the aging process, the symptomatology of common diseases, and the structure of various health care systems enables registered nurses to make more decisions involving patient care. Working with a physician, the nurse-practitioner is totally responsible for a given number of patients. After the initial examination, she decides whether to carry out treatment herself or refer the patient to the physician. At times this decision is affected by the attitude of the patient himself, although acceptance of an expanded role for nurses has generally been positive. (FM)

- 3953 Verderese, M.L.** *New nurse; greater responsibility and authority can make her a more effective agent for development.* Health (Washington, D.C.), 9(3), 1977, 17-19. Engl.

The author advocates an expanded role for the nurse that will enable her to extend primary health care to the presently underserved rural populations of developing countries. Her 1st priority will be preventive medicine and community health and she should encourage the community to help itself. In order to overcome anticipated resistance by physicians, the author recommends: a strategy that includes raising the nurse's consciousness; negotiations between nurses, doctors, and medical authorities to formulate job descriptions and educational requirements; and flexible legislation that will allow the nurse to adapt her role to changing conditions. (RMB)

- 3954 Verderese, O., Garcia, J.C.** *Decision de estudiar enfermeria. (Decision to study nursing).* Educacion Medica y Salud (Washington, D.C.), 8(4), 1974, 390-407. Span.

The results of a PAHO study reveal factors that discourage the pursuit of nursing as a career, including low income, the position of women in society, and the low prestige of nursing compared to other health professions. Many nurses have difficulty deciding on a career and the nursing shortage in Latin America is aggravated by the fact that superior students tend to choose more prestigious courses of study. In order to make nursing more attractive, it is recommended that the labour market for nurses be expanded by increasing the number of posts and improving working conditions. (RMB)

- 3955 Verderese, O.** Organizacion Panamericana de la Salud, Washington, D.C. *Formacion de personal de enfermeria en la America Latina. (Training of nursing personnel in Latin America).* Washington, D.C., Organizacion Panamericana de la Salud, 1973. 11 p. Span. 9 refs.
Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973.
Bound with entries 3519, 3533, 3684, 3893, and 3970 in entry 3532.

An analysis of nursing education in terms of the general educational system reveals tendencies toward multidisciplinary education, the expansion of the nurse's role, and the creation of different levels of integrated training programmes for nurses, practical nurses, and auxiliary nurses that encourage upward mobility. Nevertheless, these tendencies are the result of general educational reforms initiated in developed countries rather than the product of objective studies of nursing services and health care demands in Latin America. The author proposes six questions that could serve as a basis for such studies. (RMB)

- 3956 Wagstaff, L.A., Beukes, P.J.** *Paediatric primary health care nurse project in Soweto.* South African Medical Journal (Capetown), 52(27), 1977, 1086-1088. Engl.

A shortage of doctors and hospital facilities has led to the establishment of primary health care clinics in Soweto (South Africa). The clinics are staffed by teams of four pediatric nurses who have undergone in-service training in diagnosis and treatment, preventive medicine, maternal child health, and family planning. Each nurse treats some 20 patients a day and refers serious cases (approximately 20%) to a physician. Continuing self-education is stressed and the nurses' diagnostic accuracy and treatment standards are checked regularly. This approach, which can provide health care for a greater number of people, warrants further investigation and promotion. (DP-E)

IV.2.2 Nonprofessional

See also: 3519, 3520, 3522, 3829, 3941, 3949, 3955, 4047, 4056

- 3957 Burke, G.A.** Pan American Health Organization, Washington, D.C. *Nurse-midwifery in the Caribbean.* Bulletin of the Pan American Health Organization (Washington, D.C.), 11(4), 1977, 332-337. Engl. 9 refs.

As a trusted member of her community and a respected health authority, the Caribbean nurse-midwife is vital to family health. Usually on 24-hour call, she handles not only ongoing health care but also emergency cases and home deliveries. As part of her constantly expanding role, she often heads nursing teams while also serving as an administrator and teacher. The author urges established health services to give more recognition to the nurse-midwife for the tasks she performs and the responsibilities she bears. (DP-E)

IV.3 Primary Family Planning and Midwifery Care

IV.3.1 Professional

See also: 3947, 3949, 3960, 4046

- 3958 Asoka, R.** *Midwifery in India.* Bulletin of the American College of Nurse-Midwives (Atlanta, Ga.), 16, Nov 1971, 122-125. Engl.

The roles of the traditional *dai*, the professional nurse-midwife, and the nurse-midwife auxiliary in India are examined. Job descriptions for the two professional categories are given, including the training required for each. In 1961, there were 404 training schools for nurse-midwives and 201 for auxiliaries; an estimated 200 additional schools have been opened since then. A typical rural health centre where a nurse-midwife might expect to find employment is also described. (FM)

IV.3.2 Nonprofessional

See also: 3514, 3910, 3958

- 3959 Bertera, R.L., Ustonglu, N.** Pathfinder Fund, Chestnut Hill, Mass. *Training village midwives for family planning services delivery in rural*

Turkey. Chestnut Hill, Mass., Pathfinder Fund, Pathpapers Series No.1, Jul 1977. 12p. Engl.

In 1976, a 1-week training session for 10 Turkish traditional midwives stressed birth interval and parity as means of determining which couples were most in need of family planning services. Preliminary evaluation of the midwives' later performance showed that they understood the classification system well and were visiting top priority couples more frequently; contraceptive use among this target group had risen 22%. The midwives also felt less overwhelmed by their service delivery responsibilities. The Turkish government plans to extend this training programme to some 300 additional midwives. (RMB)

- 3960 Chen, P.C.** *Incorporating the traditional birth attendant into the health team; the Malaysian example.* Tropical and Geographical Medicine (Haarlem, Netherlands), 29(2), Jun 1977, 192-196. Engl.

When it was discovered that young trained midwives were meeting with resistance from established traditional birth attendants in rural Malaysia, both types of midwives were urged to adopt complementary roles, each according to her area of expertise. The young midwife, by virtue of her 2 years of scientific training, manages the actual delivery, cuts the cord, and cares for the newborn. The traditional birth attendant, knowledgeable in the many traditional duties expected of her by the people, provides advice and instructions regarding antenatal and postnatal taboos and proper behaviour to ensure a safe delivery and a normal infant, supervises the performance of precautionary measures during labour and the ritual disposal of the afterbirth, washes soiled linen, performs the traditional postpartum massage, etc. The traditional birth attendant continues to receive her usual fee from the family while the trained midwife is paid by the government. In this way, the two can be present at the same delivery without interfering with each other. This new approach was tested in the District of Kota Bahru, Kelantan State, the bastion of traditional Malay practices, with the result that the number of births attended by the trained midwives rose from an average of 34.8% (1966-1970) to 62.4% (1972-1975). (HC-L)

- 3961 Chen, P.C.** *Assessment of the training of the traditional birth attendant of rural Malaysia.* Medical Journal of Malaysia (Singapore), 31(2), Dec 1976, 93-99. Engl. 30 refs.

About 50% of births in rural Malaysia are attended by indigenous midwives, or *bidan kampungs*, highly respected members of the community who carry out a number of traditional practices that, although culturally acceptable, can endanger the lives of mother and child. Some of these traditional birth attendants (TBAs) were given a brief training course and their work was compared with that of their untrained counterparts. It was found that the partly-trained midwives had learned to avoid dangerous practices and the mortality rate was much lower for mothers they attended.

The Malaysian government has taken measures to encourage all traditional birth attendants to seek training in family planning and child health as well as safe delivery techniques and it is especially hoped that no new TBAs will begin practicing without some training. (DP-E)

- 3962 Mangay-Angara, A.** *New status for the hilot.* World Health (Geneva), Nov 1977, 18-21. Engl.

Also published in Arabic, French, German, Italian, Persian, Portuguese, Russian, and Spanish.

In 1954, when a Philippine Department of Health survey revealed that 75% of births were assisted by traditional birth attendants, a programme was initiated to train these *hilot*s in hygiene and basic midwifery in the hope of reducing infant and maternal mortality. Nurses gave courses of 12 weekly 3-hour meetings to groups of 10 *hilot*s, who received UNICEF midwifery kits and record books at graduation. Now that they have official recognition, *hilot*s are also encouraged to pursue other activities such as notifying communicable diseases, organizing mothers' classes, family planning, etc. A 1974 survey resulted in a *hilot* registry that helps supervisors locate and identify *hilot*s who need further training. (RMB)

- 3963 Murray, G.F.** *Folk healers of Petit-Goave; a proposal for research and program action in rural Haiti.* New York, Columbia University, Teachers College, Program in Applied Anthropology, 12 Jun 1977. 48p. Engl.
Unpublished document.

Despite the presence of a health centre in Meilleur, Petit-Goave, Haiti, the population continues to rely heavily on four types of folk healer: the *chalatan* or injectionist, the *fam saj* or midwife, the *medsin fey* ("leaf doctor") or herbalist, and the *gangan* or shaman. The 1st three are considered potential candidates for involvement in the modern health care delivery system because their practices are based on naturalistic concepts and a training programme for traditional midwives has already been implemented in the area. This paper examines that training programme and, on the basis of its strengths and weaknesses, proposes a design for a training programme for the other folk healers. (HC-L)

- 3964 Ram, E.R., Datta, B.K.** *Training and utilization of indigenous "dais" in the delivery of rural health services.* Journal of the Christian Medical Association of India (Mysore, India), 51(5-6), 1976, 154-158. Engl.

A programme for training indigenous *dais* (traditional birth attendants) was undertaken by the Integrated Health Services Project, Miraj, India, when it was discovered that over 50% of all deliveries in the project's catchment area were being conducted by these women. A list of indigenous *dais* was compiled and a course, consisting of 3 days initial training, 1 day 15 days later, and 1 day per month subsequently, was devised. The training was conducted by public health nurses and

nurse-midwives and included: the elements of good antenatal, intranatal, and postnatal care; basic cleanliness and hygiene; recognition of danger signals in pregnancy and labour; and family planning. Each *dai* was given a handbag and a set of six sealed delivery packs; she also receives a small payment from the local auxiliary nurse-midwife for each delivery conducted. Out of 186 *dais* identified, 173 (93%) came forward readily for training; most of the remaining 13 (7%) followed later. Out of the initial 173, 78.6% attended all 3 days of the initial training, 17.9% attended 2 days, and 3.5% attended 1. Subsequent attendance at monthly sessions has been very high after 18 months, perhaps because village women have evinced a preference for trained over untrained *dais*. It is concluded that *dais* are willing to learn and that their training has resulted in safer village deliveries and more referrals to the health centre. Some findings regarding *dai* knowledge prior to training, compensation, and characteristics are included. (HC-L)

- 3965 Rogers, E.M., Solomon, D.S.** *Background on traditional midwives.* In Rogers, E.M., Solomon, D.S., *Traditional Midwives as Family Planning Communicators in Asia, Case Study No.1, Honolulu, Hawaii, East-West Communication Institute, n.d., 9-63. Engl. Refs.*

This chapter describes the characteristics of traditional birth attendants (TBAs) in Indonesia, Malaysia, the Philippines, Thailand, India, Pakistan, and Mexico and critically examines the efforts that have been undertaken to involve them in national health and/or family planning programmes. Although outstanding results from such efforts have yet to be demonstrated, the authors are convinced of the necessity of introducing scientific health and family planning ideas through traditional health systems and cite the successes achieved in the People's Republic of China through the application of this approach. (HC-L)

- 3966 Shreeve, G.** *Dai care.* Nursing Times (London), 73(8), 24 Feb 1977, 260-261. Engl.

The Oxfam training programme (Lalton Kalan, India) teaches local midwives (*dais*) to assume responsibility for delivery but not for postnatal care. The *dais* are considered part-time midwives and paid a small fee for services. It is suggested that, in a poor district of Punjab, *dais* also be given responsibility for child health under the supervision of field workers. They would instruct mothers in mixed feeding using cheap, locally available, and simply produced foods and see that children are brought to the clinic at least 3 times a year and that they are immunized against poliomyelitis. (AF)

- 3967 Universidad del Valle, Division de Salud, Departamento de Medicina Social, Cali, Colombia. Secretaria de Salud Municipal, Cali, Colombia.** *Programa de Investigacion en Modelos de Prestacion de Servicios de Salud; subprograma de atencion materno-infantil; reglamento para comadronas. (Programme of Research into Models of Health Services Delivery; maternal and*

child health sub-programme; rules for traditional midwives). Cali, Colombia, Universidad del Valle, Division de Salud, Departamento de Medicina Social, n.d. 7p. Span.

Unpublished document.

A traditional birth attendant (TBA) in the health district of Cali, Colombia, is required to register with her local health centre, take a training course, refer all pregnant women for antenatal care, obtain permission before attending a delivery, and attend deliveries only in the health centre area. In return, she is considered a member of the health team and receives the supervision and support of health centre staff. This document sets forward the regulations governing the practice of TBAs, including: the contraindications to domiciliary delivery; proscribed practices; the knowledge, skills, and attitudes expected of TBAs; their role and functions; and necessary equipment. (HC-L)

IV.4 Primary Dental Care

IV.4.1 Professional

- 3968 Greene, J.C.** *Recommendations on training and qualifications of public health dentists.* International Dental Journal (The Hague, Netherlands), 27(1), 1977, 77-78. Engl.

The need for specialists in public health dentistry is recognized by dental organizations and governments throughout the world. This paper suggests that two such specialists are required: a dental officer with basic training in individual dentistry, public health, the social sciences, organization and administration of health services, and dental health education and a senior dental officer with a recognized postgraduate degree in public health dentistry plus a high level of training in public administration, biostatistics, general and dental epidemiology, and the behavioural and social sciences. In view of the evolving state of public dentistry, continuing formal education for both is recommended. (HC-L)

IV.6 Primary Environmental Health

See also: 3856, 3985, 3986, 3994, 3996, 4011, 4012, 4013, 4014, 4015, 4016

- 3969 Beaton, I.W., Hoareau, G.** WHO, Brazzaville. *Development of basic health services (national environmental sanitation programme).* Brazzaville, WHO, 11 Jan 1971. 15p. Engl.

From 1968-1970, a WHO health inspector gave refresher training to sanitary personnel and assisted in the development of a national environmental health programme for the Seychelle Islands. His activities included designing and implementing a scheme for: approximately 100 pit latrines of an approved design for the rural areas; a filariasis campaign, combining preventive and curative measures; and a refuse collection and disposal system, a sewer system, and a modern abattoir, complete with by-product plant, for the town of Victoria. Unfortunately, sanitation staff were so few

that refresher training had to be conducted on an *ad hoc* basis; increasing the number of health inspectors is foremost among the author's recommendations. (HC-L)

- 3970 Carrillo, J.M.** Organizacion Panamericana de la Salud, Washington, D.C. *Recursos humanos en saneamiento ambiental. (Human resources in environmental health)*. Washington, D.C., Organizacion Panamericana de la Salud, 1973. 52p. Span. 10 refs.
 Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973.
 Bound with entries 3519, 3533, 3684, 3893, and 3955 in entry 3532.

After defining and examining the need for environmental health measures, the author discusses the contribution to environmental health planning and legislation of the 10-year health plan for the Americas drawn up in 1972. Proposed environmental health personnel are classified and described by function (executive and administrative, research, teaching, technical, auxiliary, etc.) and the requirements for education, in-service training, postgraduate courses, refresher courses, auxiliary training, etc., are set forth. Suggestions for making careers in environmental health more attractive and future projections, conclusions, and recommendations are presented. (RMB)

- 3971 Songonuga, O.O.** *Role of the engineer as a member of a "health team" responsible for community care delivery*. Nigerian Medical Journal (Lagos), 7(3), 1977, 361-366. Engl.

At present, the sanitary engineer is, in Nigeria and elsewhere, a civil engineer with a postgraduate specialty in water management and wastewater and refuse disposal. Although he is assumed to have a broad and thorough understanding of the whole range of environmental conditions affecting human well-being, his training is, in fact, deficient in the health aspects of the engineering structures. It is suggested that a complete environmental health engineering programme, separate from the civil engineering programme and rooted in medicine as well as engineering, be developed to replace the sanitary engineering specialty and be offered, preferably, within the faculty of health sciences. This paper discusses the role and functions of and proposes a suitable curriculum for the environmental health engineer. (HC-L)

- 3972 WHO, Brazzaville.** *Second Meeting of Teachers of Health Sciences (Environmental Health)*, Brazzaville, 10-16 June 1975. Brazzaville, WHO, 1975. 66p. Engl.
 Second Meeting of Teachers of Health Sciences (Environmental Health), Brazzaville, Congo, 10-16 Jun 1975.

The proceedings of this WHO conference on environmental health training in Africa include the opening address, a list of participants, and a summary and evaluation. Working documents appended to the proceedings cover categories of environmental health personnel,

public health engineering education in developing countries, means of strengthening environmental health training programmes, and public health services and training in Kenya. Job descriptions are given for such personnel as sanitary engineers, health inspectors, auxiliary sanitarians, and health aides. Present training methods and curricula in universities and schools of health are described and suggestions made for their improvement. (FM)

IV.7 Teaching Aids

IV.7.1 Rural Health Care

See also: 3511, 3516, 3517, 3618, 3837, 3871

- 3973 AFYA: Journal for Medical and Health Workers, Nairobi.** *Red eye*. AFYA (Nairobi), 11, Nov-Dec 1977, 177-181. Engl.

This article outlines the diagnosis and treatment of the red eye in its various forms. The forms are classified by their main physical manifestations. The red watery eye with vision affected stems from acute glaucoma, iridocyclitis, herpes simplex, adenoviruses, or bacterial corneal ulcers. The red watery eye with vision not affected is caused by allergic conjunctivitis or chronic conjunctivitis. The red sticky eye usually indicates ophthalmia neonatorum. Although the treatment varies with the problem, the examination of every red eye must start with a search for foreign bodies. (DP-E)

- 3974 All Africa Leprosy and Rehabilitation Training Centre, Addis Ababa.** *Guide to leprosy for field staff*. Addis Ababa, All Africa Leprosy and Rehabilitation Training Centre, Jun 1977. 62p. Engl.

Designed to familiarize African medical and paramedical personnel in the field with the diagnosis and treatment of ordinary leprosy cases, this training manual is part of a total leprosy control programme. An introductory chapter defines terms and describes the main features of leprosy. The importance of medical records maintenance and history-taking is emphasized in a chapter that includes detailed information on physical examinations. A leprosy classification scheme is followed by information on treatment of special cases and reactions as well as on the use of the drug DDS. A concluding chapter describes treatment of secondary complications such as hand and foot wounds and eye diseases. (FM)

- 3975 All Africa Leprosy and Rehabilitation Training Centre, Addis Ababa.** *Essentials of leprosy. 2 edition*. Addis Ababa, All Africa Leprosy and Rehabilitation Training Centre, 1977. 54p. Engl.

Designed for professional medical personnel, this handbook describes the main characteristics of leprosy and its treatment. The epidemiology of the disease is covered, followed by a brief description of bacteriology and experimental leprosy. The clinical features and classification of leprosy, effects on the nervous system, immunology, and diagnosis are also the subjects of brief chapters. Chemotherapy is discussed in detail including

descriptions of various anti-leprosy drugs. Reaction to treatment is described, while further chapters discuss leprosy-related eye diseases, physical therapy, foot deformities, and the principles of leprosy control, rehabilitation, and health education. (FM)

- 3976 Aranda Pastor, J.** *Epidemiologia general; texto-guia para estudiantes de medicina, tomo primero.* (General epidemiology; textbook-manual for medical students, volume 1). Merida, Venezuela, Universidad de Los Andes, 1971. 476p. Span.

This simply-written but comprehensive book on epidemiology is intended as a textbook for medical students and a handbook for general practitioners. It covers: the basic principles of epidemiology, its relation to other medical disciplines, and its uses; the natural history of disease; epidemiological investigation and methodology; and immunization. Environmental health and the epidemiology of malnutrition are treated in a 2nd volume. Each chapter is followed by a list of supplementary reading. (HC-L)

- 3977 Aranda Pastor, J.** *Epidemiologia general; texto-guia para estudiantes de medicina, tomo segundo.* (General epidemiology; textbook/handbook for medical students, volume 2). Merida, Venezuela, Universidad de Los Andes, 1971. 2v.(811p). Span.

This textbook for medical students, in 2 volumes, covers the concept and principles of epidemiology, the natural history of communicable and noncommunicable disease, epidemiological methods, the epidemiological bases of applied immunology, epidemiological factors in the physical environment, and an epidemiological focus on nutrition problems. A number of exercises for the student are appended to volume 2 and an alphabetical index to volumes 1 and 2 is included in both volumes. (HC-L)

- 3978 Berry, E.C., Kohn, M.L.** *Introduction to operating room technique. 4 edition.* New York, McGraw-Hill, 13 Oct 1972. 342p. Engl.

This textbook, intended for student and graduate nurses, covers all aspects of operating room technique and patient care. Each of the 26 chapters is followed by review questions. Areas covered include the organization of the operating room, the principles of sterile technique, the surgical scrub, preparation of the patient's skin, equipment, X-ray procedures, suture techniques, the care and use of needles, and the use of radium. Specific types of surgery are also described, such as plastic surgery, orthopedics, ophthalmology, pediatrics, and gynaecological surgery. Anaesthesia is discussed at length and a brief chapter on the legal aspects of surgery concludes the text. (FM)

- 3979 Brain, E.A., Bidwell, C.M.** *How to do it: construct an audiovisual programme.* British Medical Journal (London), 10 Feb 1979, 394-396. Engl.

This article gives very clear instructions concerning the preparation and construction of an audiovisual programme. Before assembling the material, it is important to consider the most suitable method and medium available for the purpose and the message, script, visual display, audio track, text, and completed package of the communication. The message to be conveyed should be outlined and then summarized, using lists, numbers, and headings to clarify the material and appropriate visuals. An accompanying transcript of the audiotape and handbook with references, test questions and answers, problems, and detailed diagrams or tables enhances the convenience and flexibility of the communication. (AF)

- 3980 Bronner, F.** *Aid to teaching nutrient requirements and allowances.* American Journal of Clinical Nutrition (Bethesda, Md.), 30(5), May 1977, 726-727. Engl.

Basic nutrients for a recommended daily dietary allowance have been arranged on a logarithmic scale to allow for easy comparison of various nutrients. This classification also enables the student to relate quality and quantity of food and to compose scales for different age groups and physiological states. (RMB)

- 3981 Butt, H.W.** Indo-Dutch Project for Child Welfare, Hyderabad, India. *Child health calendar; "help to develop a healthy child."* Hyderabad, India, Indo-Dutch Project for Child Welfare, 30 Sep 1977. lv.(unpaged). Engl.

This child health calendar provides village women in India with simple maternal child health information in an eye-catching and instructive form. The calendar covers 15 months, corresponding to a woman's last 3 months of pregnancy and the 1st 12 months of her child's life. Only days of the week are indicated as dates are to be filled in by the mothers themselves; this link with the regular calendar allows it to be used both as a reminder of clinic appointments and as a health record. Each month is accompanied by a page of relevant illustrated information on nutrition, hygiene, etc. The calendars are to be distributed and checked by the village health workers. Calendars are currently available in either English or Telugu; texts in other Indian languages are planned. (HC-L)

- 3982 Children in the Tropics, Paris.** *Informal talk.* Children in the Tropics (Paris), (108-109), 1977, 27-29. Engl.

Advice on giving an effective informal talk is presented. The importance of having a clear, well-defined subject and being properly prepared are noted and the physical conditions for the talk and the content and manner of presentation are considered, including tips on how to involve the audience. Finally, the technique of giving a demonstration, including preparation, implementation, and appraisal for results, is discussed. (DP-E)

- 3983 Children in the Tropics, Paris.** *Technical outline for the training of primary health care workers: fever.* Children in the Tropics (Paris), (108-109), 1977, 30-32. Engl.

This article outlines the knowledge a trained primary health care worker needs in order to deal with fever, discussing diagnosis, causes, treatment, and advice to mothers whose children have fever. (DP-E)

- 3984 Colombia, Departamento de Energia, Agua y Telecomunicaciones.** *Bomba de agua manual para areas rurales de paises en desarrollo. (Hand-operated water pump for rural areas in developing countries).* Bogota, Departamento de Energia, Agua y Telecomunicaciones, Direccion Central de Proyectos, Informe U.P. No.RE59, Oct 1976. 1v.(various pagings). Span. Unpublished document.

The most appropriate method of bringing potable water to rural populations continues to be shallow wells and hand-operated pumps. Unfortunately, most currently-available hand pumps are complicated, expensive, and break down with excessive frequency. Recently, however, a new model has been developed whose submerged parts are made of heavy plastic and can be mass-produced and whose upper parts can be constructed of locally-available materials; it is simple, inexpensive, and can be maintained by the users. This report describes, with illustrations, the design, construction, and advantages of the new model. (HC-L)

- 3985 Colombia, Ministerio de Salud Publica y Asistencia Social, Instituto Nacional para Programas Especiales de Salud.** *Manual de procedimientos en promocion comunitaria para el Programa Nacional de Saneamiento Basico Rural. (Procedures manual for promoting the National Programme of Basic Rural Sanitation in the community).* Bogota, Ministerio de Salud Publica y Asistencia Social, Instituto Nacional para Programas Especiales de Salud, Division de Saneamiento Basico Rural, Seccion de Promocion, S.B.R.P. No.0062, Jan 1975. 120p. Span.

This manual was prepared as a guide for personnel responsible for promoting Colombia's national sanitation programme in the rural community. The 1st part describes existing sanitary conditions in rural areas (including their effect on health) and the general aspects, objectives, and justification of the programme. The 2nd part outlines the various steps and procedures involved in constructing public works in conjunction with the community. Samples of the procedures and techniques (e.g., educational posters, contracts, etc.) that are described in the manual are shown in 27 annexes. (HC-L)

- 3986 Colombia, Ministerio de Salud Publica y Asistencia Social, Instituto Nacional para Programas Especiales de Salud.** *Manual de educacion sanitaria. (Sanitation education manual).* Bogota, Ministerio de Salud Publica y Asistencia Social, Instituto Nacional para Programas Especiales de

Salud, Division de Saneamiento Basico Rural, Seccion de Promocion, Aug 1974. 92p. Span.

This manual sets forth the basic information that Colombia's sanitation promoters need to impress upon the public so that people will accept and appreciate the rural sanitation programme; it also contains advice on how this information might best be presented. The various chapters treat the educational process, water and public health, some fundamental concepts related to water (e.g., the water cycle, natural sources of water, potable water, contaminated water, etc.), water-borne diseases, and some aids and methods useful in sanitation education. Numerous illustrations are included throughout. (HC-L)

- 3987 Colombia, Ministerio de Salud Publica y Asistencia Social.** *Manual para el ayudante rural de salud. (Manual for the rural health aide).* Bogota, Ministerio de Salud Publica y Asistencia Social, Division Materno Infantil y Planificacion Familiar, Departamento de Formacion y Adiestramiento de Recursos Humanos, 1977. 57p. Span.

See also entries 4036, 4037, 4038, 4039, 4057, 4058, and 4076.

The Colombian rural health aide is a full-time primary health worker who offers preventive medicine, health education, first aid, and family planning in his community of origin through home visiting and formal and informal group discussions. This manual outlines the duties of the rural health aide *vis-a-vis* maternal and child health, family planning, nutrition, accident prevention in the home, rabies, first aid, headaches and muscular pains, diarrhea in adults, eye infections, intramuscular injections, census-taking, and administration. (HC-L)

- 3988 Colombia, Ministerio de Salud Publica y Asistencia Social.** *Manual de conductas de la promotora voluntaria de salud. (Procedures manual for the volunteer health promoter).* Bogota, Ministerio de Salud Publica y Asistencia Social, Jan 1976. 27p. Span. Unpublished document.

This illustrated manual for rural health promoters gives simple instructions for recognizing and treating diarrhea, rash, cough, fever, toothache, infections of the mouth, and haemorrhage following the extraction of a tooth. Indications for referring the patient to the health centre or alerting the local epidemiological surveillance authority are included. (HC-L)

- 3989 Cordero, C.** Colombia, Ministerio de Salud Publica y Asistencia Social, Instituto Nacional para Programas Especiales de Salud. *Prensa como medio de divulgacion. (Press as a means of health education).* Bogota, Ministerio de Salud Publica y Asistencia Social, Instituto Nacional para Programas Especiales de Salud, Division de Saneamiento Basico Rural, Seccion de Promocion, S.B.R.P. No.0013, Mar 1973. 26p. Span.

After listing the advantages and disadvantages of the press and advising health workers how to deal with reporters and editors, the author discusses the format of and rationale behind news items, articles, and advice columns. Sources of information and techniques for obtaining it (interviews and research) and preparing it are discussed. Elements of journalistic style (answering the questions who, what, where, when, how, and why, for instance) are emphasized and many examples are given. Hints on writing eye-catching titles and opening sentences are included. (RMB)

- 3990 Dylak, T., and Butler, E., ed(s).** *You and your health*. Lesotho, Mazenod Institute, n.d. 3v. (various pagings). Engl.

On the premise that the development of the body is inseparable from the development of the mind, a series of simply-written, attractively-illustrated books on health has been produced for schoolchildren in Lesotho. The 1st book deals with: care of the various parts of the body; the importance of exercise, fresh air, and a proper diet; care of clothing, house, village, etc.; safety; and feelings and manners. The 2nd treats the functions of the different parts of the body and the 3rd covers the senses, sex and reproduction, and safety and first aid. The books could appropriately be used as texts in grades 5, 6, and 7, respectively. (HC-L)

- 3991 Echeverri C., O., Salazar, L. de, Alzate, A., Manrique, F. de, Jaramillo, J., Villota, S.** *Manual de medicina para la familia campesina. (Medical manual for the rural family)*. Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Servicio Seccional de Salud, Departamento del Cauca, Jul 1977. 102p. Span.

Unpublished document.

This manual explains, for the benefit of families in rural Colombia, how to safeguard child health and nutrition, care for the sick in the home, recognize and treat common ailments, and administer first aid in a number of common emergencies such as respiratory arrest, haemorrhage, drowning, accidents, poisoning, burns, and snake bites. Each item and procedure is presented in simple, step-by-step fashion, with illustrations as required; the reader can consolidate his grasp of the information by completing the quiz that follows each section. (HC-L)

- 3992 Ehlan, D.B.** *Mana: ou jeu d'education sanitaire. (Mana: a health education game)*. Lome, Service National de l'Education Sanitaire, B.P. No.2021, n.d. 48p. Fren.

See also entry 3995.

Mana was conceived as a means of encouraging African students in Togo to review, adopt, and practice the precepts of good hygiene. The game is played on a numbered board with a 6-sided die and two markers; two players proceed by correctly answering the questions corresponding to their places on the board. This document discusses the philosophy behind the game, describes the varying degrees of complexity with which

the rules can be applied, and presents a number of sample questions for use with the game. (HC-L)

- 3993 Fountain, D.E., Guevart, E.** *Infirmier: comment batir la sante; un manuel a l'usage du personnel infirmier oeuvrant dans les centres de sante urbains et ruraux. (Nurse: how to build health; a manual for nursing personnel working in urban and rural health centres)*. Zaire, n.p., Aug 1977. 255p. Fren.

Unpublished document; address correspondence to M. Franklin Baer, C.B.Z.O.-Vanga, B.P. 4728, Kinshasa 2, Zaire.

This experimental textbook was designed to teach the principles of preventive medicine to nursing personnel working in rural and urban health centres in Africa. Organized into five main sections comprising 2-4 chapters each, the manual covers: basic principles of health education and community health, including the equipping of a health centre, community diagnosis, and teaching aids; aspects of nutrition, maternal child health, and environmental sanitation; and the control of major diseases such as malaria, tuberculosis, sleeping sickness, and schistosomiasis. A chapter on vaccinations concludes the manual. Review questions on each section are included. (FM)

- 3994 Freedman, B.** *Sanitarian's handbook; theory and administrative practice for environmental health. 4 edition*. New Orleans, La., Peerless Publishing, 1977. 1413p. Engl.

This handbook was developed to fill the need for a text on environmental hygiene that is comprehensive enough for the advanced sanitarian and sufficiently non-technical in language for the beginner. Although it was written primarily for US sanitarians, previous editions have been sold in over 60 foreign countries, most of whom are less technologically advanced than the USA, and this has been borne in mind during the compilation of the present volume. Among the topics covered are the history of sanitation services, public health, microbiology, disease control, pest control, water supply and waste disposal, food quality control, housing, school sanitation, occupational hygiene and environmental pollution, hospital and nursing home hygiene, statistics, refrigeration, weights, measures, useful memoranda, etc. Numerous line drawings, graphs, charts, and illustrations appear throughout. (HC-L)

- 3995 International Journal of Health Education, London.** *"Mana", a health education game*. International Journal of Health Education (Geneva), 21(1), Jan-Mar 1978, 66-67. Engl.

See also entry 3992.

Mana, an educational game developed in Togo, strengthens health knowledge and stimulates sound health practice. It is played on a numbered board by two players equipped with dice and markers. A health-related question corresponds to each number on the board and a player is rewarded or penalized according to whether or not he answers the question correctly. Since its introduction 2 years ago, the game has been tested

three times: twice to verify its appropriateness for schoolchildren and once to explore the possibilities of using it in general school revision and community development programmes. The Ministry of Health plans to publish a whole series of books, corresponding to different sets of learning objectives, for use with the game. (HC-L)

- 3996 Journal of Environmental Health, Denver, Col.** *Continuing environmental health education; course for environmentalists.* Journal of Environmental Health (Denver, Col.), 40(4), 1977, 203-205. Engl. 9 refs.

Six lessons designed to enhance the knowledge and expertise of general environmentalists in the areas of food sanitation, vector control, housing, water supplies, waste disposal, pollution, etc., are to be presented in the form of questions in six issues of this journal. Answers to the questions will not be published in the journal; rather, a list of references to assist the student in answering them himself will be provided. The 1st series of questions and references is contained in this issue. (HC-L)

- 3997 Kakar, D.N.** *Communication and persuasion in health; some guidelines for multi-purpose health workers.* Nursing Journal of India (New Delhi), 67(5), May 1976, 103-104. Engl.

The multipurpose health worker is the chief communicator of modern health ideas to the rural population of India. For her benefit, this paper reviews the theoretical principles of persuasion, explains why some individuals respond more readily than others to health education, and sets down a number of general guidelines for making teaching more effective, e.g., reinforce the desired response as often and as soon as possible after it occurs, present one stimulus (message) at a time, repeat the message over a period of time, etc. (HC-L)

- 3998 Krupp, M.A., Sweet, N.J., Jawetz, E., Biglieri, E.G., Roe, R.L.** *Physician's handbook. 18 edition.* Los Altos, Cal., Lange Medical Publications, Jan 1976. 754p. Engl.
Also published in Italian, Polish, Portuguese, and Spanish.

This newly revised handbook is a compilation in convenient, pocket-sized format of diagnostic and therapeutic information and procedures that the authors feel to be of the greatest daily interest and value to students and practitioners of medicine. Laboratory methods and equipment for examining and analyzing the cardiovascular system, endocrine and liver functions, cerebrospinal fluid, sputum, etc., are outlined. Other sections cover parasitology, epidemiology, mycology, radioisotopes, diet, surgery, genetics, etc. Appendices containing conversion tables, an index, height/weight tables, staining methods, etc., are included. (RMB)

- 3999 Litz, J.** *Horizons; the barefoot doctor's way.* Journal of Practical Nursing (New York), 28(3), Mar 1978, 36-37. Engl.

A manual designed to teach the principles of disease treatment to barefoot doctors in rural areas of the People's Republic of China is described. Based on traditional medicine, the manual covers the individual, environmental, and climatic causes of diseases before dividing them into two categories: Yin and Yang illnesses. The symptomatology of both types is described as well as methods of examination and diagnosis. A large section is devoted to folk remedies such as herbal preparations and acupuncture. (FM)

- 4000 Locketz, L.** *Health education in rural Surinam; use of videotape in a national campaign against schistosomiasis.* Bulletin of the Pan American Health Organization (Washington, D.C.), 10(3), 1976, 219-226. Engl.

A 1973 schistosomiasis control campaign in Saramacca, Surinam, aimed to examine every inhabitant, treat all diagnosed cases, and control contributing environmental factors by spraying contaminated snails, ensuring proper drainage of standing water and swamps, building latrines, and encouraging use of the public water system. As part of the campaign's health education efforts, a cheap, locally-produced videotape featuring a case history and easy preventive measures with a soundtrack in a local dialect was shown at a district fair, at clinics, and in schools. The author discusses the quality and effectiveness of the videotape and its presentation; the campaign itself has not yet been evaluated. (RMB)

- 4001 Lorenz, J.** *Visual aids.* AFYA (Nairobi), 11, Sep-Oct 1977, 135-142. Engl.

An African Medical and Research Foundation artist, faced with the task of developing visual aids for the maternal and child health education of the pictorially illiterate Masai, made preliminary sketches and sought responses from a sample of patients. The artist found that the best results were obtained when the picture was clear with no unnecessary background and the person(s) in the picture were identifiable as Masai. This exercise showed the importance of cooperation between the artist, the educator, and the students in developing such aids. (DP-E)

- 4002 Macagba, R.L.** *Health care guidelines; for use in developing countries.* World Vision International (Monrovia, Cal.), Jun 1977. 111p. Engl. 12 refs.

These step-by-step guidelines show how people can be taught to participate in their own health care using limited community resources. The author points out the shortcomings of the Western health care delivery model, outlines an alternative strategy for dealing with the health problems of developing countries, and itemizes the things people need to know in order to protect their health. A simple methodology for planning, organizing, controlling, and evaluating a project or programme aimed at improving the health of a given population is summarized in point form. Appendices include: lists of teaching resources and reference material; sample medical records and project proposal, report, and cash-flow forms; and a strategy for a nutrition education

programme in a developing country. Numerous graphs, illustrations, and organizational charts appear throughout. (HC-L)

- 4003 MacMahon, B., Ipsen, J., Pugh, T.F.** *Metodos de epidemiologia. (Epidemiologic methods).* Mexico City, Prensa Medica Mexicana, 1969. 282p. Span. Refs. Originally published in English as MacMahon, B., Ipsen, J., Pugh, T.F., *Epidemiologic Methods*, Boston, Brown, Little, 1960.

This basic textbook on epidemiology, described as one of the clearest and most stimulating works on the subject, is intended for both medical students and practicing health workers. It discusses the place of epidemiology in the investigation of disease, the epidemiological concept of cause, ways of classifying the sick and infirm, epidemiological strategy, measuring the frequency of disease, sources of morbidity and mortality data, the relationship between personal characteristics and disease (age, sex, ethnic group, etc.), the elements of time and place in epidemiology, analytical epidemiology, and experimental epidemiology. An extensive bibliography and a comprehensive subject index follow. (HC-L)

- 4004 Nepal, Health Ministry, Department of Health Services, Community Health and Integration of Health Service Division, Training Cell.** *Village health worker (junior auxiliary health worker); operations manual.* Kathmandu, Health Ministry, Department of Health Services, Jan 1975. 76p. Engl.

This manual for village health workers (VHWs) in rural Nepal outlines basic concepts in domiciliary health services, including: the role of the VHW in the health service and the health team; the causes, recognition, and treatment of malaria, smallpox, tuberculosis, and leprosy; the human reproductive system and the various methods of family planning; the principles of healthful living; and appropriate health education regarding malaria, smallpox, tuberculosis, leprosy, and family planning. Explanations and procedures are accompanied by line drawings or photographs captioned in English and Nepalese. (HC-L)

- 4005 Neville, P.J., ed(s).** All Africa Leprosy and Rehabilitation Training Centre, Addis Ababa. *Footwear manual for leprosy control programmes; part 1.* Addis Ababa, All Africa Leprosy and Rehabilitation Training Centre, 1977. 47p. Engl. See also entry 4006.

In simple language, this manual describes the causes and treatment of foot wounds in leprosy patients. The importance of proper footwear is emphasized and the basic elements of a footwear programme are outlined. Establishing priorities, collecting data, and planning details of supplies, distribution, supervision, and staff training are covered in the 2nd chapter. A 3rd section describes the organization and essential features of small and large workshops for the production of footwear. Various types of shoes, depending on the degree of deformity of the foot, along with the production cost and

equipment needed, are presented. A final brief chapter covers patient education. (FM)

- 4006 Neville, P.J., ed(s).** All Africa Leprosy and Rehabilitation Training Centre, Addis Ababa. *Footwear manual for leprosy control programmes; part 2.* Addis Ababa, All Africa Leprosy and Rehabilitation Training Centre, n.d. 118p. Engl. 8 refs. See also entry 4005.

This simplified training manual provides step-by-step instructions in the basic procedures involved in the production of sandals and prosthetic appliances needed in a footwear programme for leprosy patients. After listing the woodworking and leatherworking tools required, it covers the maintenance of tools, methods of measuring feet and making plaster casts, the techniques of marking and cutting leather, and various means of joining such as glueing, stitching, riveting, etc. Detailed instructions for each type of footwear are given, ranging from the simple sandal to the kneeling prosthesis and ulcer healing leg for patients with a below-the-knee amputation. (FM)

- 4007 Olafson, F., Ferguson, A., Parker, A.W.** University of California, Neighborhood Health Center Seminar Program, San Francisco, Cal. *Confidentiality; a guide for neighborhood health centers.* San Francisco, Cal., University of California, Neighborhood Health Centre Seminar Program, Monograph Series No.1, 1971. 78p. Engl.

Order from: Pisani Printing Company, 485 Branman Street, San Francisco, Cal. 94107.

This guide has been prepared to help public health boards, administrators, and staff members of neighbourhood centres protect the privacy of their patients. Topics covered include concept and principles of confidentiality, special problems of confidentiality in the health centre, breaches of confidence and suggested preventive measures, medical records, and release of patient information. Selected situations for analysis and legal analysis of problem situations are presented in the appendices. (DP-E)

- 4008 Pettit, J.H.** *Simple skin formulary.* AFYA (Nairobi), 11, Nov-Dec 1977, 162-167. Engl. Originally published as Simple Pharmacopoeia for Out-Station Skin Clinics in Tropical Doctor (London), Jul 1977.

The author deplores the general defeatist attitude toward skin problems in the Middle and Far East. He lists the medicaments and prescriptions that he has found effective after 20 years experience and suggests appropriate treatment for various conditions, including acne vulgaris, eczema, candidiasis, hyperkeratosis of the feet, impetigo and other pyoderms, pityriasis versicolor, pruritis, scabies, tinea, ulcers, urticaria, and warts. (DP-E)

- 4009 Rojas Arenas, P.A.** Colombia, Ministerio de Salud Publica y Asistencia Social, Instituto Nacional de Salud. *Anotaciones para el estudio de la sociedad rural colombiana; documento de estudio del cuarto curso de capacitacion en desarrollo de la comunidad para promotores de saneamiento basico rural del Instituto Nacional de Salud.* (Notes for the study of rural Colombian society; study document of the fourth National Institute of Health training course in community development for basic rural health promoters). Bogota, Ministerio de Salud Publica y Asistencia Social, Instituto Nacional de Salud, Division de Saneamiento Basico Rural, Seccion de Promocion, S.B.R.P. No.0051, Apr 1975. 41p. Span. Refs.

This compilation of articles intended for rural health promoters in the field constitutes a guide to the sociology of rural Colombia. The various articles treat sociology and social theories, the gestation of capitalism from the 11th-16th centuries, the Spanish conquest and colonization, the Colombian civil wars and problems within the agricultural sector since 1900, violence in Colombia and its social significance, economic development and the rural population, and the agrarian reform issue. An outline of the course for which this document was developed is included. (HC-L)

- 4010 Scotney, N.** *Health centre, its buildings and facilities.* AFYA (Nairobi), 11, Jul-Aug 1977, 118-123. Engl.
Originally published as Chapter 10 in entry 1933 (volume 3).

This paper contains a checklist of questions designed to help health centre staff ensure that the buildings, gardens, equipment, and facilities of their health centres serve as a model of healthy living habits. The questions are related to five areas: cleanliness; ventilation, lighting, and pleasing appearance; eating and drinking; gardens and grounds; and rules. In addition, staff are urged to ensure that the habits and appearance of themselves and their families set an example of healthy living to those visiting the health centres. (HC-L)

- 4011 Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia.** Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; manual para construccion de letrinas de hoyo seco.* (Rural health services system; manual for constructing a dry-pit latrine). Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 13p. Span.

This illustrated manual for rural health promoters explains in step-by-step manner how to build a dry-pit latrine to serve a rural Colombian household. Advice on choosing a location for the latrine is included and exact quantities of the materials required are indicated in order to facilitate estimating the cost of construction. The

basic latrine is built of brick with a tile roof, but directions for alternative styles in wood and bamboo are also given. (HC-L)

- 4012 Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia.** Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; como escoger el sistema mas adecuado de disposicion de excretas.* (Rural health services system; how to choose the most appropriate waste disposal system). Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 4p. Span.

As a waste disposal system for a rural Colombian household, the water-flushed toilet presents a number of advantages over the dry-pit latrine: it is odourless, can be built adjacent to the house, lasts longer than the dry-pit latrine, and is more convenient to use. Since each flush requires 1 gallon of water, however, a water supply in sufficient quantity and a terrain that is porous enough to absorb it must be available. This handbook for rural health promoters sets forward the conditions favouring the construction of a water-flushed toilet and a dry-pit latrine, respectively. (HC-L)

- 4013 Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia.** Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; diagnostico para rios y corrientes.* (Rural health services system; evaluating rivers and streams). Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 5p. Span.

This handbook for rural health promoters in Colombia describes in simple, step-by-step manner how to determine whether a local river or stream is polluted and what action to take if it is. Topics covered include: the sources of water pollution, such as human wastes, industrial wastes, pesticides, etc.; the signs of water pollution; the methods of treating polluted water for drinking and household use; and whom to contact for action concerning water pollution. (HC-L)

- 4014 Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia.** Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; diagnostico para una letrina de hoyo seco.* (Rural health services system; evaluating the dry-pit latrine). Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 9p. Span.

This manual for rural health promoters explains how to convince a rural Colombian family of the advantages of using a dry-pit latrine and what to do if a family is using a latrine that is full, dirty, poorly ventilated, in a state of disrepair, or within 12 metres of a well, river, or stream. The information is presented in the form of a decision

tree, with simple, step-by-step instructions for educating the family and/or remedying the faults in the latrine; a system for evaluating whether the latrine must be moved or merely improved is included. (HC-L)

- 4015 Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; construccion e instalacion de un clorador de aljibe. (Rural health services system; construction and installation of a well chlorinator).*** Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 4p. Span.

A simple well chlorinator can be made as follows: 1 kg of sand is mixed with 250 g of calcium hypochloride, placed in a plastic bag with 6 holes in it, and placed, in turn, in a plastic jar with 2 holes in the lid and 4 in the sides. The jar is then lowered by means of a net on a cord into the well to a depth of 50 cm where it remains effective for 25 days. This illustrated manual for Colombian rural health promoters explains in step-by-step manner how to construct, install, and maintain the chlorinator. (HC-L)

- 4016 Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; diagnostico para pozos y aljibes. (Rural health services system; evaluating wells and cisterns).*** Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 13p. Span.

A well or cistern should be located more than 23 m from the nearest latrine, free of floating debris, encased to a depth of 3 m below the ground, and protected by a rim no less than 50 cm high; it must also have a properly-functioning, properly-adjusted pump. This manual for Colombian rural health promoters explains in a simple step-by-step manner what to do if a well in a rural community does not meet one or more of these requirements. (HC-L)

- 4017 Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; el micropuesto de salud. (Rural health services system: the portable health post).*** Cali, Colombia, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 14p. Span.

Rural Colombian communities that lack the services of a health post may purchase a portable medical kit known as a *micropuesto de salud*. This kit is a large wooden box containing the items necessary for treating common ailments and dealing with medical emergencies. The box is kept in the home of a community member, preferably the most centrally-located, where it is accessible to the rural health promoter. Patients are

charged for the drugs that they require and the money is used to replenish the supply. This manual intended for the rural health promoter describes the kit and its contents and explains how it is to be used and maintained. (HC-L)

- 4018 Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; plan de trabajo de la promotora. (Rural health services system; working plan of the promoter).*** Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 1v.(various pagings). Span.

The workload of the Colombian rural health promoter includes visiting each family in her area at least 6 times a year, maintaining a register of information on each member of the family, devising an appropriate programme of health education for each family, dispensing treatment for common ailments and first aid, visiting all expectant mothers 9 times a pregnancy, and meeting with each family health union (*Union Familiar de Salud*) on a regular basis. This manual discusses these activities and describes, with examples, how they can best be organized by the promoter on a daily, monthly, and yearly basis. (HC-L)

- 4019 Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; el ciclo del agua. (Rural health services system; the water cycle).*** Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 2p. Span.

See also entries 3670, 3678, 3843, 3901, 3924, 4020, 4021, 4022, 4023, 4024, 4025, 4026, and 4030.

This booklet contains the information that the Colombian rural health promoter must know and pass on to the community regarding the water cycle and its relation to health. Topics covered include the formation, quality, and quantity of rainwater and surface and subterranean water supplies. (HC-L)

- 4020 Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; diagnostico para una taza campesina. (Rural health services system; evaluating the rural latrine).*** Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 5p. Span.

See also entries 3670, 3678, 3843, 3901, 3924, 4019, 4021, 4022, 4023, 4024, 4025, 4026, and 4030.

This handbook for rural health promoters explains by means of a decision tree what to do if a family has a latrine but does not use it; if the latrine is located less than 12 metres from a river, stream, or well; if the pit of the latrine is filled to capacity; if the facility is dirty; or if the latrine is not connected to a supplementary pit. (HC-L)

- 4021** Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; manual sobre organizacion y trabajo de uniones familiares de salud. (Rural health services system; manual on the organization and work of family health unions)*. Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 19p. Span.
See also entries 3670, 3678, 3843, 3901, 3924, 4019, 4020, 4022, 4023, 4024, 4025, 4026, and 4030.

The Colombian rural health promoter is responsible for encouraging the formation of family health unions (*Uniones Familiares de Salud*) in her service area. The family health union is a voluntary organization made up of 1 member each from 20-30 neighbouring families. The union works to improve community health by identifying health problems, drawing up a health programme, approaching the appropriate authorities for advice and funding, etc. This manual-cum-handbook for rural health promoters explains, with examples, the mechanics of group organization and the techniques of group animation; the importance of tools such as the "ribbon of three colours" (an instrument for measuring child nutrition status), the portable health post (a community medical chest), the well chlorinator, and the country medical manual in eliciting interest in forming a family health union is stressed. (HC-L)

- 4022** Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; el microlaboratorio. (Rural health services system; the microlaboratory)*. Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 15p. Span.
See also entries 3670, 3678, 3843, 3901, 3924, 4019, 4020, 4021, 4023, 4024, 4025, 4026, and 4030.

The microlaboratory kit devised for the use of Colombia's health promoters contains the necessary equipment to perform seven kinds of urinalysis, take a urine culture, and examine blood samples for sugar and nitrogen. This manual explains, with the help of illustrations and colour charts, how to perform and interpret the results of these tests. Advice on maintaining the laboratory, charging for tests, and replenishing supplies is also given. (HC-L)

- 4023** Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; manual para la instalacion de la taza campesina. (Rural health services system; manual for installing a rural latrine)*. Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 12p. Span.
See also entries 3670, 3678, 3843, 3901, 3924, 4019, 4020, 4021, 4022, 4024, 4025, 4026, and 4030.

This illustrated manual for Colombian rural health promoters explains in a step-by-step manner how to construct a simple water-flushed toilet for a rural household. The toilet is built over a brick-lined pit connected by a pipe to one or more similarly-lined tanks; it is housed in a small brick building with a cement floor and flushed by pouring one gallon of water into the bowl. Advice on choosing a location for the facility is given and exact quantities of the materials required are indicated in order to facilitate estimating the cost of construction. (HC-L)

- 4024** Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; examen de agudeza visual. (Rural health services system; examination for visual acuity)*. Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 1p. Span.
See also entries 3670, 3678, 3843, 3901, 3924, 4019, 4020, 4021, 4022, 4023, 4025, 4026, and 4030.

This handbook for Colombian rural health promoters contains a simple set of instructions for using an eye chart to screen rural schoolchildren for visual abnormality. (HC-L)

- 4025** Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. *Sistema rural de servicios de salud; manual de supervision. (Rural health services system; manual of supervision)*. Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 27p. Span.
See also entries 3670, 3678, 3843, 3901, 3924, 4019, 4020, 4021, 4022, 4023, 4024, 4026, and 4030.

A methodology for evaluating the work of Colombia's rural health promoters has been developed. The methodology consists of formulae corresponding to the various functions of the promoter. The left side of each formula specifies her activities *vis-a-vis* the function and the right indicates the procedure for supervising these activities. This document contains all 10 formulae plus

some general advice; together with the manuals for rural health promoters it constitutes a guide for rural health promoter supervisors. (HC-L)

- 4026** **Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. Sistema rural de servicios de salud; la caja maestra.** (Rural health services system; the master register). Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 34p. Span.

See also entries 3670, 3678, 3843, 3901, 3924, 4019, 4020, 4021, 4022, 4023, 4024, 4025, and 4030.

All the information that the Colombian rural health promoter needs in order to organize her work is contained in the master register: a small box containing separate files on all family health unions, households, children aged less than 6 years, children aged 6-14 years, adults, couples, and pregnant women in her service area. This manual gives detailed instructions for filling out and keeping up-to-date the cards relative to each of these files. (HC-L)

- 4027** **Sinha, K.S., Bawa, P.S.** Central Health Education Bureau, Directorate General of Health Services, New Delhi. *Pretesting of the flash-cards on malaria as an educational aid in PHCs (primary health centres) Pataudi and Bhorakalan.* Research Findings (New Delhi), 9(3-4), Oct 1976-Jan 1977, 1-3. Engl.

A set of eight flash cards, each accompanied by an appropriate message in English and Hindi, was developed in India for use by health workers in malaria education. The cards were tested before a group of 50 mostly illiterate individuals of both sexes and of various ages. The cards successfully held the attention of this audience and most of the group was able to understand their message. Two more cards were added at the suggestion of 12 health workers before whom a 2nd test was conducted. Unfortunately, the time involved in using this teaching aid (18 minutes) is too long for home visits with the present caseload of 200 houses a day. (HC-L)

- 4028** **USA, Department of Health, Education, and Welfare.** *Handbook on the prevention and treatment of schistosomiasis (a translation of a Chinese publication).* Washington, D.C., Department of Health, Education, and Welfare, Public Health Service, National Institutes of Health, John E. Fogarty International Centre for Advanced Study in the Health Sciences, Geographic Health Studies, China Health Studies Project, DHEW Publication No.(NIH)77-1290, 1977. 172p. Engl.

For sale by the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C., 20402.

This handbook on the prevention and treatment of schistosomiasis was originally published in Chinese by the Shanghai Municipal Institute for Prevention and Treatment of Schistosomiasis. It contains sections on methods of snail elimination, the proper treatment of manure, safe water use and personal protection, diagnostic measures, and the treatment of schistosomiasis patients and infected animals. This handbook is part of a series of translations of documents published in other countries on various aspects of health care. (RMB)

- 4029** **Whitaker, J.C.** USA, Department of Health, Education and Welfare, Health Services Administration, Indian Health Services, Alaska Area Native Health Service. *Guidelines for primary health care in rural Alaska.* Washington, D.C., US Government Printing Office, 1976. 571p. Engl.

This handbook for community health aides in Alaska (USA) covers: emergency medical care; treatment of the eyes, ears, mouth, and skin; the respiratory, circulatory, gastrointestinal, genitourinary, musculoskeletal, and nervous systems; mental and emotional problems; maternal child health; nutrition; communicable disease prevention and control; medical history and physical examination; health administration and clinic management; medicines; and home care of the sick. All information is simply presented and illustrated by means of line drawings and photographs where necessary; the aide is advised when a physician should be contacted but told what to do should this be impossible. (HC-L)

IV.7.2 Family Planning and Midwifery

See also: 3511, 4004

- 4030** **Servicio Seccional de Salud, Departamento del Cauca, Cali, Colombia. Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, Cali, Colombia. Sistema rural de servicios de salud; lo que una mujer debe hacer para mantener su embarazo normal.** (Rural health services system; what a woman must do to have a normal pregnancy). Cali, Colombia, Universidad del Valle, Centro de Investigaciones Multidisciplinarias en Desarrollo Rural, 1977. 1v.(unpaged). Span.

See also entries 3670, 3678, 3843, 3901, 3924, 4019, 4020, 4021, 4022, 4023, 4024, 4025, and 4026.

This simply-written, illustrated manual is intended for pregnant women in rural Colombia. It contains: advice on nutrition, diet, and hygiene; prohibitions against cigarettes, coffee, and non-prescription drugs; methods of relieving or preventing vomiting, fatigue, poor circulation, constipation, hemorrhoids, and cramps in the legs; and indications for seeing a doctor (oedema, haemorrhage, premature labour, etc.). (HC-L)

V Formal Evaluative Studies

V.1 Health Manpower

See also: 3893, 3899, 3907, 3937, 3961, 4025

- 4031 Axton, J.H.** *Effectiveness of nursing sisters in primary paediatric care.* South African Medical Journal (Capetown), 52(7), 6 Aug 1977, 279-280. Engl.

A comparison was made of the management, by nursing sisters and a pediatrician, of 76 children attending primary care clinics. In 95% of consultations, the treatment and the presumed outcome of treatment were identical. The nursing sisters identified correctly all children for whom a 2nd opinion was needed. If nursing sisters are responsible for primary care, they can be expected to refer approximately 10% of the children they see. It is suggested, however, that since respiratory tract infections account for about 50% of all primary consultations in the pediatric age group, it would be advisable to give the nursing sisters extra training in their diagnosis and management. (Modified journal abstract.)

- 4032 Baker, R.J.** USA, Department of Health, Education, and Welfare. *Community health representatives; a dilemma of incongruous objectives.* Seattle, Wash., Indian Health Service, Puget Sound Service Unit, 1970. 8p. Engl. Unpublished document; see also entries 3591, 3592, 3833, 3902, 3903, 3906, 3918, 3921, 3922, 3923, 3930, 3931, 3932, 3933, 3934, 3935, 4050, 4051, 4085, and 4100.

The Community Health Representative (CHR) Program was designed to provide US Indians with a totally self-administered scheme for identifying and reducing health-related problems. Evaluation of the programme 18 months after its inception revealed that Indian involvement in its administration was poor and that the CHR had taken on the role of a clinical auxiliary rather than that of a liaison between the Indians and the health service. It was therefore recommended that representatives of the Indian Health Service be given training in community development to prepare them to assist the tribes in assuming responsibility for the programme, that the CHR curriculum be modified and lengthened in order to strengthen the liaison orientation, and that the CHR training centre staff be made responsible for continuing CHR education and programme evaluation. (HC-L)

- 4033 Catts-Levy, S.** *Triggering change; a case study of innovation.* Social Work in Health Care (New York), 2(3), Spring 1977, 319-328. Engl. 8 refs.

A Haifa University School of Social Work (Israel) project studied the methods required to bring about improvements in the social work services intended to support patients during surgery and rehabilitation in the University's Rambam Hospital. The 1st stage, an attitude survey, was designed to collect data pertaining to the role of the social worker within a hospital, increase awareness of present inadequacies, and heighten receptivity to change. The 2nd stage involved the establishment of an experimental student training unit. The key to introducing change was seen as motivation, which in this case was provided by the success of the low-budget demonstration unit. (FM)

- 4034 Chacon Nieto, E., Arias R., F.** Universidad Central de Venezuela, Escuela de Salud Publica, Caracas. Venezuela, Ministerio de Sanidad y Asistencia Social. *Investigacion sobre Medicina Simplificada en Venezuela. (Research into the Simplified Medicine programme in Venezuela).* Caracas, Universidad Central de Venezuela, Escuela de Salud Publica, 1975. 2v. Span. 14 refs.

This document describes a research project designed to formulate and test a methodology for evaluating the performance of auxiliaries involved in the Venezuelan programme of simplified medicine. Qualified nurses interviewed 20 rural dispensers and observed their work in 14 areas ranging from immunization to health education. Their performance was then measured against a predetermined scale and the results are discussed and set forth as statistical data. The authors recommend that the evaluation be carried out on a wider scale, dispensers receive more supervision, the quantity and quality of medical records maintenance be improved, etc. Appendices include maps and statistical data. Volume 2 contains the forms and questionnaires used in the evaluation. (RMB)

- 4035 Chang Hernandez, N., Donoso Infante, A., Repetto Dapelo, G., Rico Velasco, J.** Chile, Ministerio de Salud Publica, Programa de Extension de Servicios de Salud Materno Infantil y Bienestar Familiar (PESMIB). *Participacion de la enfermera, matrona y auxiliar de enfermeria, en la atencion materno infantil en consultorios y postas 25 areas PESMIB, 1976. (Participation of the nurse, midwife, and auxiliary nurse in maternal and child health clinics and posts in 25*

PESMIB areas — 1976). Santiago, Ministerio de Salud Publica, Unidad de Investigacion y Evaluacion, Dec 1976. 190p. Span.

See also entries 3734, 3780, and 4068.

A study was undertaken to identify the actual functions of nurses, midwives, and auxiliary nurses in Chile's maternal child health facilities and to determine whether or not the role of the auxiliary had expanded. Two questionnaires were designed to elicit the qualifications, job descriptions, and personal characteristics of the staff sampled and were administered to 78 nurses, 88 midwives, and 490 auxiliary nurses from clinics and posts in the country's 25 maternal child health zones. The findings confirmed the hypothesis that health personnel assume greater responsibility as their access to higher-level services diminishes. This document presents in 95 tables and discusses the findings of the study; the questionnaires used are appended. (HC-L)

4036 Colombia, Ministerio de Salud Publica y Asistencia Social. *Evaluacion del programa del ayudante rural de salud abril 1977; area de aceptacion.* (April 1977 evaluation of the rural health aide programme; acceptability). Bogota, Ministerio de Salud Publica y Asistencia Social, Apr 1977. 4p. Span.

Unpublished document; see also entries 3987, 4037, 4038, 4039, 4057, 4058, and 4076.

An evaluation of the rural health aide programme in Colombia revealed that aides are well-accepted by the community but not, as yet, by the medical establishment; instead of functioning as a liaison between the community and the health centre, aides are perceived as rivals of professional health personnel and communication between the two is virtually nil. This paper sets forward a number of recommendations for clarifying the role of the aide in the community and for improving relations between the aide and the health centre staff. (HC-L)

4037 Colombia, Ministerio de Salud Publica y Asistencia Social. *Evaluacion del programa del ayudante rural de salud abril 1977; area de adiestramiento.* (April 1977 evaluation of the rural health aide programme; training). Bogota, Ministerio de Salud Publica y Asistencia Social, Apr 1977. 12p. Span.

Unpublished document; see also entries 3987, 4036, 4038, 4039, 4057, 4058, and 4076.

Based on an evaluation carried out in three areas of Colombia, problems related to the design, implementation, suitability, content, and administration of the rural health aide training programme are identified and a number of recommendations for improving it are put forward. These focus mainly on improving coordination between the various agencies and levels of government involved in the programme, duplicating as far as possible working conditions in the training situation, and redefining the programme's goals and content in the light of rural health aides' experience in the community. (HC-L)

4038 Colombia, Ministerio de Salud Publica y Asistencia Social. *Evaluacion del programa del ayudante rural de salud abril 1977; area realizaciones.* (April 1977 evaluation of the rural health aide programme; accomplishments). Bogota, Ministerio de Salud Publica y Asistencia Social, Apr 1977. 5p. Span.

Unpublished document; see also entries 3987, 4036, 4037, 4039, 4057, 4058, and 4076.

Evaluation of the accomplishments of the rural health aide programme in three areas of Colombia revealed the need to standardize the number of households assigned per aide, increase the aides' preventive activities, modify the aides' daily register to accommodate the reporting of these activities, increase the emphasis on teaching skills in the training of aides, and educate the health establishment in the utilization of aides, particularly in following up appointment defaulters. (HC-L)

4039 Colombia, Ministerio de Salud Publica y Asistencia Social. *Evaluacion del programa del ayudante rural de salud abril 1977; area de tecnicas.* (April 1977 evaluation of the rural health aide programme; technique). Bogota, Ministerio de Salud Publica y Asistencia Social, Apr 1977. 5p. Span.

Unpublished document; see also entries 3987, 4036, 4037, 4038, 4057, 4058, and 4076.

Observation of Colombian rural health aides in the field revealed that 97% were properly uniformed and equipped for work, 86% had established a good rapport with the families assigned to them, 65% geared their work to the particular needs of each family, 62% took advantage of all available opportunities for health education, all those observed administered medicines according to the guidelines in their manuals, and 38% had undertaken activities in addition to those foreseen by the programme. Problems encountered by the aides related to lack of support from the medical establishment, insufficient training in some areas, community unwillingness to accept family planning on religious grounds, shortages of medical supplies, and lack of teaching materials. This paper discusses these findings, making suitable recommendations where warranted. (HC-L)

4040 Colombia, Ministerio de Salud Publica y Asistencia Social. Asociacion Colombiana de Facultades de Medicina, Bogota. *Estudio experimental de servicios de salud en Colombia.* (Experimental study of health services in Colombia). Bogota, Ministerio de Salud Publica y Asistencia Social, Dec 1973. 82p. Span.

An experimental study was undertaken in three rural areas of Colombia to determine whether auxiliary health workers operating within a supportive health infrastructure can increase health services coverage. The auxiliaries were trained to carry out a set of well-defined norms and procedures and professional personnel were given suitable orientation in supervising them. Later, auxiliaries were evaluated by means of: an analysis of a

sample of their case histories; direct observation; comparison of their diagnoses with those of a doctor; a survey of the community for possible changes in knowledge, attitudes, and practices *vis-a-vis* the health services; and an analysis of hospital and health centre records for changes in the demand for health services. The greater part of this report is devoted to the presentation and discussion of the evaluation findings. (HC-L)

- 4041 de Jaimes, C., Rueda S., B.** *Estudio de practicas maternoinfantiles y utilizacion de los servicios de salud en un area rural en relacion con las actividades de la promotora, Valle de Sibundoy, 1972-1975 (informe final).* (Study of maternal and child health practices and the utilization of health services in a rural area in relation to the deployment of health promoters, Sibundoy Valley, 1972-1975; final report). Cali, Colombia, Universidad del Valle, Division de Salud, Departamento de Enfermeria, 1977. 1v.(various pagings). Span. 13 refs.

A study was undertaken in the Sibundoy Valley, Colombia, to determine the cost-benefit of using programmed learning in training health promoters and the effect of the health promoters on the health status and habits of the population. A questionnaire concerning morbidity, mortality, and sociological characteristics was administered to heads of households and another regarding maternal and child health was administered to all mothers of reproductive age prior to deploying the promoters (1973) and again in 1975. After studying the resulting data, the authors feel that positive changes in MCH knowledge and family planning attitudes and practices are probably due, at least in part, to the deployment of the health promoters. The system of programmed learning in the training of health promoters was found to be more effective than traditional teaching methodology and well accepted by the students; it was more expensive than the traditional method when a programme had to be designed or adapted but less expensive when the programme was ready-made. Questionnaires used in the study are appended and numerous tables of data are included. (HC-L)

- 4042 Duttera, M.J., Harlan, W.R.** *Evaluation of physician assistants in rural primary care.* Archives of Internal Medicine (Chicago, Ill.), 138(2), Feb 1978, 224-228. Engl. 13 refs.

To determine the type and quality of health services provided by physician assistants and medex, 14 primary care practices in a rural area of the southeastern USA were evaluated. Contrary to previous studies, the medical assistants evaluated were not affiliated with training institutions. Three main patterns of doctor/assistant relationships were observed: the assistant saw all patients initially, followed by the physician; both physicians and assistants handled patients relatively independently; and patients were selectively assigned to the assistant. Given suitable facilities, a case-load appropriate to his training, and opportunities to consult with the physician, the medical assistant provided care comparable to that given by the physician. (FM)

- 4043 Hookey, P.** *Social workers' contributions to community development activities in primary health care settings.* Urbana, Ill., University of Illinois at Urbana-Champaign, School of Social Work, May 1978. 33p. Engl.

Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978.

Unpublished document.

The suitability of primary health care agencies as host settings for community development activities is discussed. Social workers' contributions to primary care are examined in terms of primary, secondary, and tertiary prevention, which includes such activities as health and nutrition education, case-finding, screening, sex education, treatment of drug and alcohol addiction, etc. Examples from the USA, Canada, UK, the Netherlands, Denmark, Brazil, Poland, New Zealand, and Israel are provided. The implications of these contributions for health care policy, training, and research in developed and developing countries are considered. (DP-E)

- 4044 Kurtzman, C.** *Scale of community dental health ideology; establishing a valid means of measurement for evaluation.* Journal of Public Health Dentistry (Raleigh, N.C.), 37(4), Fall 1977, 275-280. Engl. 15 refs.

To improve the evaluation of extramural dental programmes in the USA, a scale was developed to assess changes in the attitudes of students who had participated in community-oriented programmes compared with those of students who had not. Based on the differences in attitude among traditional, urban practitioners and those in a more community-related dental career, the test contained 23 statements requiring one of four responses: agree, strongly agree, disagree, or strongly disagree. Additional trials proved that the results of this test were sufficient to classify all the participants as either public-health-oriented or private-practice-oriented. It is felt that such a test could be used as a means of identifying potential career choice and community curricular differences among dental schools and even as a criterion for admission to dental schools. (FM)

- 4045 Leppard, B.J., Heshmati, G., Nikpoor, N., Rastkar, G.** *Dermatology survey in four villages in Iran.* Clinical and Experimental Dermatology (Oxford, UK), 2(3), Sep 1977, 227-234. Engl.

A March 1976 survey of 840 inhabitants of four rural villages in Iran (two with village health workers and two without) revealed a similar incidence of skin diseases and indicated that village health workers have not been adequately trained in the recognition and treatment of these complaints. The major problems were pediculosis capitis and corporis, pityriasis versicolor, eczema, and skin tumours. Statistical data are included. (Modified journal abstract.)

- 4046 Loghmani, M., Mitra, M.** *Evaluation of trained midwives in a copper-T IUD insertion program in Isfahan, Iran.* International Journal of Gynaecology and Obstetrics (Baltimore, Md.), 14(3), 1976, 205-207. Engl.

Part of the evaluation of the performance of midwives in the family planning programme of Iran, this study compared data from 252 insertions of the Cu-T-200 IUD by trained midwives and 646 insertions by doctors. Although the net 1-year cumulative continuation rate was higher among those who had IUDs inserted by doctors, there was no significant difference in net cumulative 1-year rates of pregnancy, expulsion, or removal for medical reasons. In proving that trained midwives can safely and effectively insert IUDs, this study suggests that an expanded role for midwives in family planning programmes would ensure a more efficient use of health personnel. (FM)

- 4047 Proyecto Integral de Enfermería, Guatemala.**

Estudio de recursos y necesidades de enfermería en Guatemala; las actividades del personal que trabaja en enfermería. (Study of nursing needs and resources in Guatemala; the activities of nursing personnel). Guatemala City, Proyecto Integral de Enfermería, 1972. 1v.(various pagings). Span.

In addition to deficient numbers, the nursing profession in Guatemala is plagued by poor utilization, low salaries, inappropriate training, and lack of standards governing its responsibilities. A nationwide enquiry into the numbers, functions, activities, and preparation of nursing personnel was therefore launched with a view to providing a basis for formulating suitable job descriptions, standards of deployment, and training programmes. This document presents the study findings in the form of short verbal summaries and numerous tables of statistical data; the actual formulation of recommendations has been left to the profession itself. (HC-L)

- 4048 Rebello, L.M., Verma, S.P.** *Basic health worker and his recipient group; a diagnostic study for health education in malaria.* Social Science and Medicine (Oxford, UK), 11(1), Jan 1977, 43-53. Engl. 18 refs.

The role of the basic health worker in malaria control in Indian villages is described. In 1971 in the Pataudi Block, Haryana State, India, a probability sample of 100 males and 100 females were interviewed individually to provide data for health education in malaria control. Despite the high credibility of basic health workers and the subjects' faith in allopathic treatment for malaria, two-thirds of the fever cases were missed. These were mostly cases of fever between visits. Coupled with this was a low awareness of how malaria is transmitted, complacency about fever, and perception of active surveillance as fever enquiry and treatment. Cognitive and non-cognitive forces operating in surveillance activities are outlined and educational and other inputs given. (Modified journal abstract.)

- 4049 Rivera C., J.** *Asociación Colombiana de Facultades de Medicina, Bogotá. Encuesta nacional de droguitas en Colombia; análisis del papel del boticario en la prestación de servicios de salud. (National survey of pharmacists in Colombia; analysis of the role of the druggist in health services delivery).* Bogotá, Asociación Colombiana de Facultades de Medicina, División de Medicina Social y Población, Dec 1973. 164p. Span. 38 refs.

Since many Colombians ask their pharmacists for health and family planning advice, a study was undertaken to determine the general characteristics of druggists, the type of advice they give to their clients, their level of knowledge regarding certain specific drugs, and the source of their knowledge about drugs. The study was based on the questionnaire responses of 179 pharmacists — 73 metropolitan, 22 small city, 31 town, and 53 small town. This monograph describes the sociocultural context, methodology, findings, and conclusions of the study; the questionnaire is included in the appendix. (HC-L)

- 4050 Theisen, L.S.** USA, Department of Health, Education, and Welfare. *Report; the Yakima community health representative program.* Seattle, Wash., Indian Health Service, Puget Sound Service Unit, Jan 1976. 1v.(various pagings). Engl.

Unpublished document; see also entries 3591, 3592, 3833, 3902, 3903, 3906, 3918, 3921, 3922, 3923, 3930, 3931, 3932, 3933, 3934, 3935, 4032, 4051, 4085, and 4100.

A review of the Yakima community health representative (CHR) programme (USA) reveals weaknesses in the areas of CHR/health service communications, CHR training, and CHR supervision. It is therefore suggested that health service staff take formal and informal steps to keep in touch with CHRs, that a CHR manager be hired and a personnel policy (sample appended) be adopted, that CHRs be provided with proper office accommodation and a secretary to handle their calls, and that package courses and disease-specific protocols (samples appended) be made available for their ongoing education. Additional recommendations concern transportation and the current reporting system. (HC-L)

- 4051 USA, Department of Health, Education, and Welfare.** *CHR program evaluations; with special reference to proposed program expansions.* Seattle, Wash., Indian Health Service, Puget Sound Service Unit, May 1976. 42p. Engl.

Unpublished document; see also entries 3591, 3592, 3833, 3902, 3903, 3906, 3918, 3921, 3922, 3923, 3930, 3931, 3932, 3933, 3934, 3935, 4032, 4050, 4085, and 4100.

In 1976, the eight tribes served by the Puget Sound Service Unit of the US Indian Health Service submitted requests for additional community health representatives (CHR). This paper examines each of the eight CHR programmes with respect to their current management, planning capabilities, and effectiveness and

makes special recommendations regarding the requests. (HC-L)

- 4052 Wongvichit, P., Davis, R.** *Getting the services to the villages; village health volunteers in Chaiyaphum, Thailand.* n.p., 24 May 1978. 14p. Engl. 12 refs.

Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978.

Unpublished document.

This paper reviews in detail one of many health projects designed to utilize untapped human resources to serve the villagers of developing countries. The authors contend that auxiliaries in all developing countries can, with proper training, motivation, and support, deliver many of the basic health services to villages not served by government health posts. The success of the Chaiyaphum project is described and considerations raised by the use of volunteers in Thailand are discussed. (DP-E)

- 4053 Zeighami, B., Zeighami, E., Ronaghy, H.** *Stretching health manpower; the rural health auxiliary.* Canadian Journal of Public Health (Toronto, Ont.), 68(5), Sep-Oct 1977, 378-381. Engl.

To determine the effect of village health workers on mortality and fertility rates, a census was conducted in villages served by the Kavar Village Health Worker Project, Iran, and in a number of control villages. The impact of the health workers on vital rates was readily apparent: infant mortality was 64:1 000 live births in the experimental and 128 in the control village; the crude death rate was 10:1 000 in the experimental and 17 in the control; and the crude birth rate was 40:1 000 in the experimental and 45 in the control. It is concluded that village health workers, after a fairly short (15 months) period of deployment, can succeed in significantly lowering both death and fertility rates. (HC-L)

V.2 Organization and Administration

See also: 3825

- 4054 Barboza Ruiz, O.O., Serra Canales, J.** *Consideraciones sobre el crecimiento y desarrollo del niño en la zona de San Ramon (Costa Rica). (Thoughts on child growth and development in the zone of San Ramon, Costa Rica).* Revista Centroamericana de Ciencias de la Salud (San Jose), 3(7), May-Aug 1977, 275-289. Span.

Since 1972, a community medicine project has been providing 80 000 people in the zone of San Ramon, Costa Rica, with integrated health care. The project is characterized by a high level of coverage, a functioning referral system, a team approach, an at-risk orientation, and active community participation. This paper briefly discusses the successes and failures associated with the

application of the last three concepts and gives a report of an inquiry and its preliminary findings into infant mortality in San Ramon. (HC-L)

- 4055 Chinese Medical Journal, Peking.** *Communicable disease control in Chishan County.* Chinese Medical Journal (Peking), 3(6), Nov 1977, 358-360. Engl.

This article describes the methods, particularly preventive measures, that have been successfully used to combat communicable diseases in Chishan County, People's Republic of China. There is a highly efficient system, closely monitored and often reorganized, for reporting the outbreak of disease. Medical personnel act quickly when disease does break out. In addition, epidemiology and laws of occurrence of diseases are thoroughly researched. These measures are coupled with intensive health education of medical personnel, volunteers, and the masses. (DP-E)

- 4056 Climent, C.E., de Arango, M.V., Plutchik, R., Leon, C.A.** *Development of an alternative, efficient, low cost mental health delivery system in Cali, Colombia; part I: the auxiliary nurse.* Social Psychiatry (Berlin, Germany), 13(1), 1978, 29-35. Engl.

A survey of a low-cost experimental mental health programme in Cali, Colombia, where one group of 30 emergency psychiatric patients was treated over a 3-month period by specially trained auxiliary nurses and another group by the traditional service using interns and residents, revealed that the 1st group experienced a greater decrease in symptoms as measured by psychiatric ratings and a self-report scale. A questionnaire completed by family members indicated similar results. No differences were found between the two systems regarding patients' attitudes towards services, on a self-esteem scale, or on a social adjustment scale. The authors recommend the continuation of the new system. (RMB)

- 4057 Colombia, Ministerio de Salud Publica y Asistencia Social.** *Evaluacion del programa del ayudante rural de salud abril 1977; area de logistica. (April 1977 evaluation of the rural health aide programme; logistics).* Bogota, Ministerio de Salud Publica y Asistencia Social, Apr 1977. 3p. Span.

Unpublished document; see also entries 3987, 4036, 4037, 4038, 4039, 4058, and 4076.

In the area of logistics, the Colombian rural health aide programme was found to lack a coherent system for delivering pay and supplies to the rural health aides on a regular basis. Moreover, the delivery of supplies, which could have provided an occasion for contact between the professional health worker and the aide, completely bypassed the medical establishment. It was therefore recommended that a commission made up of members of the relevant agencies and levels of government be set up to establish the appropriate channels for the acquisition, distribution, and control of material and equipment for rural health aides. (HC-L)

- 4058 Colombia, Ministerio de Salud Publica y Asistencia Social.** *Evaluacion del programa del ayudante rural de salud abril 1977; area de supervision. (April 1977 evaluation of the rural health aide programme; supervision).* Bogota, Ministerio de Salud Publica y Asistencia Social, Apr 1977. 6p. Span.
Unpublished document; see also entries 3987, 4036, 4037, 4038, 4039, 4057, and 4076.

Evaluation of the Colombian rural health aide programme revealed the lack of a standardized effective system for supervising the aides. In particular, the programme lacked a set of technical criteria for judging the aides' performances, a clear delineation of the responsibilities of the various health professionals *vis-a-vis* the aides, and an established system of relaying information from the supervisors to the programme directors. This paper makes a number of recommendations for improving the situation. (HC-L)

- 4059 Commission des Affaires Sociales, Paris.** *Coordination de la prevention au service de l'usager; rapport annuel de l'inspection des Affaires Sociales, 1974. (Coordination of prevention in the interests of the users; annual report of the Social Affairs inspection, 1974).* Information Psychiatrique (Paris), 53(1), Jan 1977, 65-72. Fren.

The 1974 annual report of the French Social Affairs Commission criticizes the fragmentary character and lack of organization of preventive services. Emphasis is placed on primary prevention in an environmental health context with special attention to high-risk groups and health education. The artificial and often harmful distinction and opposition between preventive and curative services are still very clear in financial health policy, where the choice must be made between allocating funds to hospital maintenance costs or prevention. (Modified journal abstract.)

- 4060 Cowan, B.** *Overcoming resistance to health care delivery in developing areas.* Ludhiana, India, Christian Medical College, Community Health Department, 28 Apr 1978. 8p. Engl.
Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978.
Unpublished document.

The organization of the health services in the field practice area of the Christian Medical College in the Punjab, India, is described. In 1976, the department surveyed the area covered by its health clinics to determine why 80% of local children never attended these clinics. It was found that mothers of low caste, largely illiterate, were not inclined to use the clinics. Special free clinics and feeding programmes, aimed at this group and well-publicized, failed to get a response. The problem was solved by training volunteers to visit the home, prepare the food, and feed the child. Statistical data are included. (DP-E)

- 4061 Dissevelt, A.G.** *Integrated health care for mother and child in health centres in Kenya.* Tropical and Geographical Medicine (Haarlem, Netherlands), 28(2), Jun 1976, 150-151. Engl.
Joint Meeting of the Netherlands and Belgian Societies of Tropical Medicine, Rotterdam, Netherlands, 12 Apr 1975.

With a view to making the best use possible of available resources, an alternative system of delivering maternal child health services was developed and tested at the rural health centre in Masil, Kenya. The new system involved a number of changes in clinic operation, including the replacement of separate clinic days for different MCH activities with one daily integrated clinic, the introduction of records that facilitated the discovery of at-risk cases, and the initiation of a simplified recording system with codes for diseases and prescriptions. The impact of the changes on the clinic's utilization rate was evaluated 1 year after their implementation and compared with baseline data collected earlier. Parameters utilized were the card-holding rate of women aged 15-44 years living within 10 km of the centre and the immunization rate of children aged 0-23 months in the same area. Data was collected using the random cluster sampling technique. The evaluation showed no marked increase in the card-holding rate but considerable increases — 20% and 30% — in the immunization rates for BCG and smallpox among children aged 0-1 year, bringing coverage rates for BCG and smallpox in the area up to 58% and 53%, respectively. Since these figures exceeded the results obtained in nearly all areas of the country during the same period, it is concluded that the changes in health centre operation made a positive contribution to clinic effectiveness. (HC-L)

- 4062 Duarte Gaspar, E., de Almeida, M.J., Taddei, J.A., Ribeiro, E.C., da Silva Pereira, S., Vilanova, M.C., de Albuquerque Cordeiro, H., Ferreira de Souza, J.C.** *Avaliacao preliminar do Servico de Saude Escolar da IX Regiao Administrativa, Rio de Janeiro; estudo da populacao coberta e analise operacional de um subprograma. (Preliminary evaluation of school health services of the 9th administrative region of Rio de Janeiro; study of the population covered and an operational analysis of a subprogramme).* Revista de Saude Publica (Sao Paulo, Brazil), 9(4), Dec 1975, 441-454. Portuguese. 12 refs.

A 1974 preliminary evaluation of part of Rio de Janeiro's school health services (Brazil) revealed high morbidity and low coverage rates among 3 240 1st-year schoolchildren. The author urges that school health services be reinforced and special attention given to the training of elementary schoolteachers in health education and the recognition of basic health problems. Other recommendations included increased cooperation between university and community health services and the institution of a special programme for assessing the students' vision. Statistical data are included and examples of the questionnaires used in the evaluation are attached. (RMB)

- 4063 Dunlop, D.W.** *Preliminary research findings on the economics of the rural health service system in Uganda.* In Messing, S.D., ed., *Rural Health in Africa*, East Lansing, Mich., Michigan State University, African Studies Centre, Rural Africana: Current Research in the Social Sciences, No.17, Winter 1972, 29-38. Engl. 9 refs.

For complete document see entry 3029 (volume 5).

The economics of the Ugandan rural health care system are examined. From 1932-1972, the number of health care facilities quadrupled, doubling in the last 10 years of that period alone. During those same 40 years, there was a 150% increase in the use of the facilities and a corresponding increase in the cost of the system. As a result of these services, infectious diseases have, for the most part, been brought under control and mortality has declined sharply. The Ankole Pre-school Prevention Programme, a mobile health service delivery system begun in 1974 that stresses preventive measures and education, is also examined briefly. Statistical data are included. (DP-E)

- 4064 Eason, J.C., Lucas, J.L., Anderson, J.** *Feasibility study; rural health delivery service, Republique Centrafricaine.* Washington, D.C., American Public Health Association, Division of Internal Health Programs, Dec 1975. 65p. Engl.

An American team undertook a study of the health sector in the Central African Republic (CAR) to assess CAR's commitment to the provision of rural health services, the feasibility of developing a health system that could eventually be extended with national resources to rural areas, and the role of AID and other donor agencies in developing this system. CAR was judged to be genuinely committed to the progressive development of rural health services although somewhat unrealistic in planning them. This document contains an analysis and critique of the health services and makes recommendations for action on the part of AID and the Peace Corps. (HC-L)

- 4065 Gish, O.** *Development of health services in Bangladesh.* Dacca, n.p., Feb 1976. 79p. Engl. Unpublished document.

An evaluation of the present status of health services in Bangladesh is accompanied by recommendations for their improvement. The centralized administrative structure of the Ministry of Health is analyzed and suggestions are made for its reorganization. Health expenditures are outlined; health manpower resources, as well as needs, at the professional and auxiliary levels are described. Hospital facilities are examined with emphasis on the *thana* rural health centre scheme. These centres should concentrate more on providing primary care to the community and less on inpatient services. Most important among rural manpower needs are an estimated 36 000 basic health workers. (FM)

- 4066 Indonesia, Department of Health.** *Primary health care; some experiences from Indonesia.* Jakarta, Department of Health, May 1978.

lv.(various pagings). Engl.

Unpublished document.

The history of the development of primary health care in Indonesia is traced with emphasis on early problems faced and attempted solutions. The continuing development of a comprehensive community health programme designed to shift the responsibility for health care from the professionals to the people is described and the positive and negative factors of this programme and possibilities for the future are examined. Appendices include: statistical data; a flow chart for the coordination mechanism for community participation and another for the objectives, input, and output of the programme; a paper on community health development in Karanganyar; and a paper on non-formal health education. These last two have been abstracted separately. (DP-E)

- 4067 Kaiser, I.H.** *Obstetrics in Cuba, 1974.* *Obstetrics and Gynecology* (New York), 49(6), Jun 1977, 709-714. Engl. 9 refs.

Contemporary Cuban maternity care is described in detail to reveal the improvements made from 1957-1974. The rate of hospital delivery has risen to 97% with the development of polyclinics, rural hospitals, and maternity homes. High-risk patients from all areas are referred to urban centres. There has been an expansion of neonatology training and services and new maternity laws for women workers have encouraged prenatal care and breast-feeding. The birth rate has declined, while standards of care and training have risen. Emphasis on specialized training and a hierarchy of supervisor-teachers ensure that standards remain high throughout the country. (FM)

- 4068 Leiva Leiva, M., Celis San Felix, V.** Chile, Ministerio de Salud Publica, Programa de Extension de Servicios de Salud Materno Infantil y Bienestar Familiar (PESMIB). *Condiciones de eficiencia de los servicios materno infantiles 25 areas PESMIB — 1976; estudio comparativo 1974-1976. (Efficiency of the maternal child health services in 25 PESMIB areas — 1976; 1974-1976 comparative study).* Santiago, Ministerio de Salud Publica, Unidad de Investigacion y Evaluacion, Jan 1977. 74p. Span.

See also entries 3734, 3780, and 4035.

In 1974 and again in 1976, facilities in Chile's 25 maternal child health zones underwent an efficiency evaluation. Each facility's overall performance and performance-by-function (i.e., inpatient pediatrics, outpatient pediatrics, premature and newborn care, inpatient obstetrics, outpatient obstetrics and gynaecology, and family planning) were graded according to a set of normative criteria and expressed in the form of a percentage. These percentages were then set forward in tables and graphs for comparison purposes. This document presents and analyzes the data from the two evaluations. (HC-L)

- 4069 Ortegón, E., Pérez Gama, A., Ballera, G.** Colombia, Departamento Nacional de Planeación. *Programa de cuantificación del plan de desarrollo-recursos humanos del sector salud; aplicaciones de la programación lineal en la planeación del sector salud. (Quantification programme of the development-human resources plan of the health sector; application of linear programming to health sector planning)*. Bogotá, Departamento Nacional de Planeación, Documento Analítico de Trabajo No.17, Jan 1974. 25p. Span. 12 refs.

This document presents an analysis of the scope and effects of Colombia's *Servicios de la Erradicación de la Malaria (SEM)* with a view to: identifying the SEM's shortcomings and priorities; demonstrating, in action, a technique of evaluation called "linear programming"; and investigating the possible limitations of this purely quantitative method of evaluation when applied to an essentially social service such as health. The SEM was chosen for the analysis because of its experience and vast accumulation of statistical data. (HC-L)

- 4070 Pan American Health Organization, Washington, D.C.** *Health research in Latin America*. Washington, D.C., Pan American Health Organization, Scientific Publication No.275, Oct 1973. 73p. Engl.

This report synthesizes observations made in specific countries and judgments of informed people concerning health research in Latin America in the 5-10 years preceding its publication. Separate chapters treat: differences in the state of development of health research between the various Latin American countries; the issues that each country must face in determining what its health research policies should be; biomedical research in a cultural, political, and economic context; the organization of research at the university and the institute level; external support for research; and the development of regional research efforts. A short, chapter-by-chapter summary of the report's contents follows. (HC-L)

- 4071 Parker, A.W.** *Consumer as policy-maker; issues of training*. American Journal of Public Health (New York), 60(11), Nov 1970, 2139-2153. Engl.
See also entry 3529.

This paper deals with issues in the training of consumers serving on policy-making boards of neighbourhood health centres that arose during the 1968-1969 Berkeley Consumer Health Project. Topics discussed include: the organizational background; the need for and length of training; the geographical and social setting; the project staff; planning; the workshop programme and sessions; the analysis of the programme; relationships with other board members, the staff at the centre, the larger health care system, the community, and the funding agency; training results; implications for other training programmes; etc. (DP-E)

- 4072 Ratcliffe, J.** *Social justice and the demographic transition; lessons from India's Kerala State*. International Journal of Health Services (Westport, Conn.), 8(1), 1978, 123-144. Engl. 51 refs.

The social justice theory of demographic transition is used to explain the dramatic reductions in mortality and fertility in Kerala State, India. According to this theory, such demographic trends reflect general improvements in political equality and social development that are revealed by an examination of the distinctive features of Kerala's political economy. Land reforms have led to a more equitable distribution of wealth, universal primary education is an accomplished fact, the level of political participation is high, and improved distribution of health services has led to better utilization of these facilities. The resulting improvement in the quality of life is considered responsible for the decrease in the birth and death rates, which are now among the lowest in India. (FM)

- 4073 USA, Agency for International Development, Department of State.** *Análisis del sector salud colombiano 1974. (Analysis of the health sector in Colombia, 1974)*. Washington, D.C., Agency for International Development, Department of State, May 1974. 359p. Span.

This analysis of the health sector in Colombia begins with a study of the health and demographic situations and general health policy. Special problems of maternal child health, nutrition, family planning, disease control, accidents, and accessibility are discussed. A section on the maintenance and resources of the system covers health manpower and training, existing and proposed facilities, finance, planning and administration, information services, and research. Resumes of the evaluation of the 1973 programme and the proposed 1975-1976 programme are presented in closing. Copious statistical data are included. (RMB)

- 4074 USA, Agency for International Development, Department of State. Colombia, Ministerio de Salud Pública y Asistencia Social.** *Análisis del sector colombiano de salud pública. (Analysis of the public health sector in Colombia)*. Washington, D.C., Agency for International Development, Department of State, Dec 1971. 353p. Span.

Material covered in this comprehensive analysis of the public health sector in Colombia is presented under these topics: health conditions in Colombia; the Colombian response to its health problems and the evolution of a national health policy; the strengths and weaknesses in the organization of Colombia's health services; human, material, and financial resources for health; the role of health in development; some special themes, including the regionalization of integrated health care, the maternal and child health programme, and nutrition; the new health policy and national health plan; and some prerequisites to the implementation of the national health plan. Numerous graphs and tables of statistical data are included throughout. (HC-L)

- 4075 Wegman, M.E.** *Frontier for prevention.* Bulletin of the Pan American Health Organization (Washington, D.C.), 11(2), 1977, 100-110. Engl. Second Gustavo Baz-Myron E. Wegman Lecture, Hermosillo, Mexico, 31 Mar 1976.
Also published in Spanish in *Boletín de la Oficina Sanitaria Panamericana* (Washington, D.C.), 83(1), 1977.

This lecture stresses the importance of preventive medicine with emphasis on environmental health, self-care activities, and health education. A comparison of primary health care in the People's Republic of China and Cuba shows how different methods can be used to achieve equally high standards of preventive medicine. Maternal child health and occupational health, especially of farm workers, are chosen as examples of the particular needs of specific groups. The case of migrant workers points out the need for collaboration in health care and the example of the USA-Mexico-Border Public Health Association is cited. The author concludes by calling for a comprehensive approach to preventive medicine with subprogrammes directed at specific groups based on age, physiological status, or occupation. (FM)

V.3 Planning

See also: 3936, 4064

- 4076 Colombia, Ministerio de Salud Publica y Asistencia Social.** *Evaluación del programa del ayudante rural de salud abril 1977; área de planeamiento.* (April 1977 evaluation of the rural health aide programme; planning). Bogotá, Ministerio de Salud Publica y Asistencia Social, Apr 1977. 13p. Span.
Unpublished document; see also entries 3987, 4036, 4037, 4038, 4039, 4057, and 4058.

Evaluation of the Colombian rural health aide programme revealed these weaknesses in the area of programme planning: failure to involve key agencies in the decision-making process or inform them of the programme's aims; poor delineation of responsibilities and coordination among programme committee members; inappropriate and/or non-existent guidelines for the selection of candidates, the definition of caseloads, and data collection procedures; etc. This paper sets forward a number of specific recommendations for overcoming these problems. (HC-L)

- 4077 England, R.** *More myths in international health planning.* American Journal of Public Health (New York), 68(2), Feb 1978, 153-159. Engl. 48 refs.

Attempts to summarize the weaknesses of health services in developing countries have resulted in the propagation of a number of misleading oversimplifications. For example, because most people in developing countries live in poor, rural areas, it has automatically been assumed that health care efforts should be concentrated there. This generalization denies the fact that urban centres are growing at an alarming rate and that urban

slums already house more than 33% of the urban population, many of whom are desperately in need of health care. Another myth implies that disease in the Third World is simple to prevent and easy to treat. This may be true in a technical sense, but, in fact, most illness in poor countries is so deeply rooted in poverty and culture that it cannot possibly be eradicated or prevented without revolutionary changes in the lifestyles of millions. A 3rd myth is the referral system of health care delivery: observations in the field have indicated that the referral system functions only on paper. A more realistic aim would be to provide the widest possible range of assistance at the 1st, and often only, point of contact. A 4th myth, the type that advocates the training of 30 auxiliaries for the price of one doctor, overlooks the fact that, without proper training, a well-designed job description, and adequate remuneration, the 30 auxiliaries will be just as ineffective as a single doctor when faced with so many patients and problems. The author concludes with a plea for the sort of health planning that is based on a problem-solving approach and not constrained by arbitrary technologies and solutions. (HC-L)

- 4078 Henao Machado, F.** *Investigación del proceso de planificación de la salud en Antioquia.* (Investigation of the health planning process in Antioquia). Revista de la Escuela Nacional de Salud Publica (Medellin, Colombia), 1(1), Aug 1974, 13-20. Span. 12 refs.

Several years after the introduction of new health planning techniques in the Department of Antioquia, Colombia, evaluation of the planning process was deemed necessary. The evaluation methodology took the form of four distinct inquiries into the relationship between development in the health sector and development in other socioeconomic sectors, the effect of the planning process on the internal characteristics of the health sector, the administration of the planning process within the relevant institutions, and the possibilities for correcting faults in the planning process. This paper outlines the specific activities involved in each of the four inquiries. (HC-L)

- 4079 McEwen, R., Hall, J.** *Planning health services; demand or need?* Medical Journal of Australia (Sydney), 2(9), 28 Aug 1976, 350-352. Engl. 8 refs.

This paper discusses the currently popular approach to planning health services based on demand predictions. From a consideration of the demand concept and the problems of measuring present demand and forecasting future demand, it is concluded that this approach to planning will not provide health care that serves the best interest of patients or achieves an overall efficient use of scarce resources. The development of an approach based on need rather than demand is seen as compatible with providing health services in the best interests of the individual as patient and the community as tax payers. (Modified journal abstract.)

- 4080 Neri, A.C.** *Formacion del recurso humano y las necesidades de los servicios de salud. (Manpower training and health services needs).* Educacion Medica y Salud (Washington, D.C.), 9(3), 1975, 272-284. Span.

Health manpower problems in Latin America are often directly related to the organization of the health care system and national health care policies. Health policy planning in Latin America has been complicated by the difficulty of adapting concepts that are successful in other countries or political systems to local conditions, an emphasis on numbers and statistics rather than quality, and poorly defined objectives and goals. To improve planning, better methodologies must be developed that will take into account such factors as future needs, community participation, and the role of medical schools and schools of public health. (RMB)

- 4081 Souza, J.P. de, Raczynski, D., Patina, G.B., Ribeiro, A.T., Feliu, E.** *Notes on health care planning in Latin America and the Caribbean.* Revista de Saude Publica (Sao Paulo, Brazil), 11(2), Jun 1977, 279-283. Engl.

Health planning in Latin America and Caribbean countries has not, to date, resulted in better health due to: the nonspecific nature of the goals and targets set out in health plans; the lack of awareness on the part of health planners of the relationships between health and economic, social, cultural, and political issues; the domination of the health services by physicians; the existence of a strong, influential private sector alongside an uncoordinated public sector; the existence of a highly-developed multinational drug industry alongside smaller, state-owned industries; etc. It is suggested that better understanding of these factors plus a more judicious distribution of health funds is the key to more effective health planning. (HC-L)

- 4082 Taussig, M.** *Nutrition, development, and foreign aid: a case study of U.S.-directed health care in a Colombian plantation zone.* International Journal of Health Services (Westport, Conn.), 8(1), 1978, 101-121. Engl. 45 refs.

Based on a case study of Rockefeller and AID intervention in the Cauca Valley, Colombia, this article describes the political characteristics and inadequacies of US-sponsored health care planning and research in the Third World. Special emphasis is placed on nutrition in rural areas. It is suggested that lack of extensive land reforms to redistribute wealth and government policies supported by US interests are to blame for the lack of real progress in the attempt to eradicate malnutrition. An historical analysis is given of the politico-economic development of agriculture and nutrition in the area as well as the development of US intervention in the health field. At the same time, other approaches to the problem of malnutrition are suggested. (Modified journal abstract.)

- 4083 Tejada de Rivero, D.** *Organizacion Panamericana de la Salud, Washington, D.C. Procesos de planificacion de salud en America Latina.*

(*Health planning processes in Latin America*). Washington, D.C., Organizacion Panamericana de la Salud, 1973. 9p. Span.

Conferencia Panamericana sobre Planificacion de Recursos Humanos en Salud, Ottawa, Canada, 10-14 Sep 1973.

Bound with entries 3518, 3521, 3541, and 3632 in entry 3534.

In theory, health planning in Latin America should incorporate all aspects of health, take place within a context of social and economic development planning, and encourage optimal utilization of available resources. In practice, planning methodologies and implementation procedures have been either too simplified or too technically-oriented to include all the necessary elements. The author discusses some of the lessons that have been learned from planning attempts in Latin America in the 1960s and makes recommendations for future efforts, especially in the field of health manpower planning, which has been neglected until now. (RMB)

- 4084 Ugalde, A.** *Health decision making in developing nations; a comparative analysis of Colombia and Iran.* Social Science and Medicine (Oxford, UK), 12(1A), Jan 1978, 1-7. Engl. 22 refs.

Health decision-making in Iran and Colombia, developing countries with similar health care problems, is compared. In Iran, decisions are made almost entirely on political grounds and budgetary control is highly centralized; demand is determined by the ruler's whim or pressure from subversive groups. In Colombia, technocrats in the health ministry and the provinces make most of the decisions, but a more open political system and a free press help to clarify the people's needs. Many of Iran's top health officials are physicians trained in the USA who consider health care a privilege rather than a right, while their counterparts in Colombia tend to be public health oriented. In both countries, many agencies make decisions that affect health care and often work at cross purposes. Efforts to coordinate operations have met with little success. (DP-E)

- 4085 USA, Department of Health, Education, and Welfare.** *Tribal health programs, evolution and revolution; a report on the fiscal year 1975 community health representative contract negotiations and renewals.* Seattle, Wash., Indian Health Service, Puget Sound Service Unit, Health Education Branch, Jun 1974. Iv.(various pagings). Engl.

Unpublished document; see also entries 3591, 3592, 3833, 3902, 3903, 3906, 3918, 3921, 3922, 3923, 3930, 3931, 3932, 3933, 3934, 3935, 4032, 4050, 4051, and 4100.

During the 1974 community health representative (CHR) contract renewals, the Western Washington (now Puget Sound) Service Unit of the US Indian Health Service took steps to assist US tribes in assuming greater responsibility for programme planning and contract negotiations. These efforts were reflected in a need for fewer Indian Health Services/tribal contacts and better quality and more timely submission of tribal

documentation during the 1975 negotiations and resulted in very good contract outcomes for 1975. (HC-L)

- 4086 WHO, Geneva.** *Interrelations between health programmes and socio-economic development.* Geneva, WHO, WHO Public Health Papers No.49, 1973. 54p. Engl.

The relationship between health and socioeconomic development is examined in both planned and market economies in terms of need, expectations, and priorities. The main problems of developing countries, i.e., personnel shortages and distribution patterns, as well as problems of drug dependence and abuse, family planning, health education, food hygiene and standards, disease control, rehabilitation, radiation medicine, and the control of environmental pollution are discussed. A paper on planning, a report of technical discussions, and an annotated bibliography are included. (RMB)

V.4 Geographic Distribution of Health Services

- 4087 Arellano, J.P., Boccardo, H., Corey, G., de Kadt, E., Gutierrez, R.** Universidad Catolica de Chile, Centro de Estudios de Planificacion Nacional, Santiago. *Salud publica y bienestar social. (Public health and social welfare).* Santiago, Centro de Estudios de Planificacion Nacional, Universidad Catolica de Chile, Mar 1976. 332p. Span. Refs.

Articles by physicians, economists, sociologists, and other professionals probe the nature and causes of existing inequalities in the distribution of health care services in Chile. They examine the distribution of health risks and resources, the structure and characteristics of the health sector, comparative accessibility of socialized medicine to workers and employees, 1964-1973 health policies and programmes, public health expenditure and distribution in 1969, morbidity and mortality, malnutrition and its effects on the population, the environment and its effects on health, and scientific and technological capability and public health. Appendices include an evaluation of the current system of recording health statistics in Chile, a glossary of terms, and a list of the communities served by each of the national health service's 55 hospital zones. (HC-L)

- 4088 Gusmao Lobo, L.** *Problema hospitalario en Brasil. (Hospital problem in Brazil).* San Jose, Centro Interamericano de Adiestramiento en Comunicaciones para Poblacion, Asociacion Demografica Costarricense, 1975. 6p. Span. Unpublished document.

Statistical data are cited to illustrate the dearth and maldistribution of hospital facilities in Brazil. For example, only 58% of Brazil's 2 200 municipalities are provided with hospital services, 40.5% of the country's hospital beds are located in state capitals, and the overall bed:population ratio of 1:380 varies between 1:110 in the ex-state of Guanabara and 1:2 270 in the state of

Maranhao. The situation has been aggravated in recent years by government health expenditures that have failed to keep up with either inflation or population growth. Similar data from other Latin American and developed countries have been included for comparison purposes. (HC-L)

- 4089 Gusmao Lobo, L.** "Deficit" *brasileño de recursos humanos en el sector salud. (Health manpower deficit in Brazil).* San Jose, Centro Interamericano de Adiestramiento en Comunicaciones para Poblacion, Asociacion Demografica Costarricense, 1975. 9p. Span. Unpublished document.

Numerous statistics are cited to show that Brazil is faced with both absolute shortages and maldistribution of health professionals. For example, 48% of all Brazilian municipalities lack the services of a doctor; 36%, of a dentist; 47%, of a pharmacist; and 83%, of a veterinarian. Moreover, most of these unserved municipalities are located in the three least-developed regions of the country (the north, northeast, and central-west) and account for about 35% of the country's population. Some discussion of the detrimental effect of rapid population growth on the country's development effort is included. (HC-L)

- 4090 Walker, G., Gish, O.** *Inequality in the distribution and differential utilization of health services; a Botswana case study.* Journal of Tropical Medicine and Hygiene (London), 80(11), Nov 1977, 238-243. Engl. 16 refs.

In order to identify and quantify utilization and referral patterns within the health services of Botswana, methods were developed to determine 1) the number of people living within specific distances of all staffed health facilities (hospitals, health centres, and clinics), 2) distances traveled by outpatients and inpatients for treatment, and 3) the numbers of outpatients and inpatients referred to a higher level within the system. Application of the methods revealed, among other findings, that 52% of the population lived more than 25 miles from any staffed health facility, that utilization rate was directly related to distance, and that the referral system did not function adequately. When this information was combined with data on health expenditure for the same period (1973-1974), it was discovered that almost £ 7.5 *per capita* was spent on people living less than 5 miles from a hospital while less than £ 1 *per capita* was spent on those living 25 miles from a hospital or 10 miles from a staffed health facility. It is concluded that a clear disparity in services provision exists in Botswana that can only be remedied by increasing primary care for the rural majority. (HC-L)

- 4091 Willis, C.E., Garnier, P.L., Engel, N.E.** *Community and individual characteristics and the use of health services in rural areas.* Massachusetts Agricultural Experiment Station Bulletin (Amherst, Mass.), 619, 1975, 5-27. Engl. 9 refs.

Three rural areas of the USA were investigated to determine the influence of the economic health of an area on the quality and quantity of health services. The methodology for the study was based on questionnaires prepared for health surveys carried out from 1970-1972. Comparing the responses, it was found that the wealthiest area was the best equipped medically and had the highest utilization rates for doctors and hospitals. This suggests that, the more readily available health services are in an area, the more likely its citizens are to use these services. Thus, the importance for future planning to improve the distribution of health services is stressed. (FM)

V.5 Financial Aspects

See also: 3665

- 4092 Borges da Silva, G.** *Approche du cout des soins dans un service de sante de base. (Approach to cost analysis in a basic health service).* Medecine d'Afrique Noire (Paris), 25(4), Apr 1978, 251-254. Fren.

A Senegalese sugar company operates a health service for its 3 000-4 000 employees at an annual cost of 3 million francs CFA. The service is staffed by 2 physicians, 7 health assistants, and support staff. Essentially an out-patient facility, it is equipped to handle emergency medical care, minor surgery, X-ray, laboratory diagnosis, and evacuation by ambulance; two beds are available for patients awaiting hospitalization. This paper lists: the drugs, most of which are obtained from the national drug company, that are used in the service; the most common diseases and conditions; and the average cost of treating 21 ailments found in 100 randomly-selected patients. The service has resulted in a satisfactory level of health among the employees and a rate of absenteeism that is only 2%. (HC-L)

- 4093 Cvjetanovic, B., Grab, B.** *Rough determination of the cost-benefit balance point of sanitation programmes.* Bulletin of the World Health Organization (Geneva), 54(2), 1976, 207-215. Engl. Also published in French and Russian.

This paper presents a simple cost-benefit-analysis method for enteric disease control sanitation programmes based on the incidence of the disease, the cost of treatment per case, the cost of sanitation per individual per year, and the effectiveness of a specific type of sanitation in preventing dysentery, cholera, or typhoid. A series of graphs and nomograms assist the nonmathematical reader. A number of examples of how the method can be implemented in different circumstances show that the addition of certain social costs will substantially improve the effectiveness of sanitation strategies. (Modified journal abstract.)

- 4094 Hoegen, M. von, Zschock, D.** *Modelo economico para evaluar el sistema de salud rural. (Economic model for evaluating a rural health system).* Revista Centroamericana de Ciencias de

la Salud (San Jose), 3(6), Jan-Apr 1977, 69-77. Span.

This model for evaluating primary health care in a rural area focuses on five aspects of a service (unit): its relative importance in terms of capital investment and operating funds, its cost structure, the efficiency of its personnel, the cost-benefit of its efforts, and its cost per unit of consumption (family). Each of these aspects is elaborated in schematic form with the relevant indicators and potential applications of each. (HC-L)

- 4095 Mejia Mejia, I.** *Gasto medico familiar en Honduras. (Family medical expenditure in Honduras).* Revista Centroamericana de Ciencias de la Salud (San Jose), 2(4), May-Jun 1976, 171-186. Span.

From 1967-1968, 2 158 households throughout Honduras were interviewed regarding their health care expenditures. It was found that families outside the country's two main economic centres (Tegucigalpa/Comayaguela and San Pedro Sula) spent more on health care than did those within them, that the largest health care expenditure in all areas was for medicines, and that the lowest income groups spent the largest proportion of their health care expenditures on medicines. When Tegucigalpa-specific findings from this study were compared to those from a similar 1975 study, it was found that the proportion of family income spent on health care had risen from an average of 2.8% in 1967-1968 to an average of 4% in 1975. (HC-L)

- 4096 Ramaiah, T.J.** *Cost-benefit analysis of the intensified campaign against smallpox in India.* NIHA Bulletin (New Delhi), 9(3), 1976, 169-203. Engl. 30 refs. See also entries 4097 and 4140.

This cost-benefit analysis estimates the benefits to Indian society resulting from the intensified campaign against smallpox by comparing the total direct and indirect costs with and without the campaign. The author's methodology for calculating these costs is outlined. He concludes that the campaign yielded a net benefit of approximately US\$132.227 million. The eradication of smallpox also resulted in an annual saving of US\$91 million that would otherwise have been spent on disease control efforts. Some benefits, such as disfigurement, suffering, likely increases in tourism, etc., could not be converted into monetary costs and are not included in the analysis. (RMB)

- 4097 Ramaiah, T.J.** *Cost-effectiveness analysis of the intensified campaign against smallpox in India.* NIHA Bulletin (New Delhi), 9(3), 1976, 205-219. Engl. 9 refs. See also entries 4096 and 4140.

A cost-effectiveness analysis of the two Indian smallpox eradication strategies, the 1962-1972 vaccination programme and the 1973-1975 intensive surveillance and containment method, designed to measure per cent reduction in the number of cases and level and degree of

endemicity, reveals that the 2nd strategy was 100% effective as compared to 79% for the 1st. The cost-effectiveness ratio was found to be Rs.7 209 million (about US\$901 million):1% of effectiveness for the vaccination programme versus Rs.2 834 million (US\$354 million):1% of effectiveness for the intensified campaign. (RMB)

- 4098 Robertson, R.L., Pabon, R., Barona, B.** *Costs of mental health services in a Colombian hospital.* American Journal of Public Health (New York), 67(10), Oct 1977, 972-974. Engl. 9 refs.

The authors describe the principal features of a methodology for determining health service costs that has been applied in the state of Valle del Cauca, Colombia. They also present selected results from an analysis of 3 years' costs at the San Isidro psychiatric hospital in Cali. The data suggest certain ways to promote efficiency in the provision of ambulatory services and also indicate some differences in costs among inpatients. The methodology, which emphasizes full costing of services, is adaptable to other institutions. Statistical data are included. (DP-E)

- 4099 Rueda S., B., de Jaimes, C. da M., Johnson, R.A.** *Costo efecto de la instruccion programada en el adiestramiento de promotoras rurales.* (Cost effectiveness of programmed instruction in training rural health promoters). Acta Medica del Valle (Cali, Colombia), 5(1), 1974, 5-8. Span.

In 1972, two groups of eight Colombian rural health promoters were taught eight lessons, one group by programmed instruction and the other in traditional classes, in order to compare the effectiveness of these two teaching methods. Tests given afterwards revealed that the trainees in the 1st group retained more of what they had learned and confirmed the superiority of the method. A cost-benefit analysis based on capital outlay and operating costs indicated that programmed instruction is also cheaper, provided that existing instructional materials are used. Statistical data are included. (RMB)

- 4100 USA, Department of Health, Education, and Welfare.** *Preliminary evaluation based upon six months data from the computerized reporting system; a document prepared as background information for task force on Indian self-determination; review of CHR contract renewal proposals.* Seattle, Wash., Indian Health Service, Puget Sound Service Unit, Community Health Representative Programs, Apr 1976. 1v.(various pagings). Engl.
Unpublished document; see also entries 3591, 3592, 3833, 3902, 3903, 3906, 3918, 3921, 3922, 3923, 3930, 3931, 3932, 3933, 3934, 3935, 4032, 4050, 4051, and 4085.

This document presents a cost-benefit analysis of eight community health representative programmes near Portland, Washington (USA). The evaluation is based on data obtained from the programmes' computerized

reporting system over a 6-month period and is set forward in the form of eight statistical summary sheets. Also included are discussions of any factors or circumstances contributing positively or negatively to the quantitative performance of each programme. (HC-L)

V.6 Cultural Aspects

- 4101 Ruiz, P., Langrod, J.** *Role of folk healers in community mental health services.* Community Mental Health Journal (New York), 12(4), Winter 1976, 392-398. Engl. 8 refs.

A 6-year study among the Hispanic ethnic group in New York City (USA) compared the effectiveness of professional psychiatrists and traditional folk healers in treating mental health problems. The cultural differences between psychiatrists and their patients, coupled with professionals' mistrust of the spiritual, generally leads to severe communication breakdowns and inadequate treatment. Folk healers have a better understanding of their patients' lives and frustrations and share their beliefs; they accept such cultural concepts as a belief in the supernatural and integrate them into their programmes. Suggestions are made for closer cooperation between professionals and traditional practitioners to improve the quality and relevance of mental health services to such groups. (FM)

- 4102 Subulola Goyea, H., Johnson, E.J.** *Benin City mothers; their beliefs concerning infant feeding and child care.* Tropical and Geographical Medicine (Haarlem, Netherlands), 29(1), Mar 1977, 103-108. Engl. 12 refs.

A 1975 survey of 143 mothers in Benin City, Nigeria, revealed many widely-held misconceptions about child care and nutrition. Some mothers did not understand the importance of breast-feeding; others did not recognize the relationship between kwashiorkor and a calorie-deficient diet. Their information came from a variety of sources, mainly friends and relatives and antenatal clinics. The authors suggest that improved health education is necessary for these mothers. Statistical data are included. (DP-E)

V.7 Epidemiological, Family Planning, MCH, and Nutritional Studies

See also: 3741, 3815, 3818, 3820, 3823, 3845, 3846, 4054, 4097

- 4103 Alfin-Slater, R.B., Jelliffe, D.B.** *New findings on infant nutrition.* Cajanus (Kingston, Jamaica), 12(1), 1979, 10-12. Engl.

Among the many new scientific discoveries about nutrition in the earliest stages of human development, it has been found that colostrum, the thick, yellowish secretion produced in the early days of lactation, is a special fluid that provides nutrition and protection against infection. It has 3 times the amount of vitamin A in human milk, is very rich in zinc and copper and relatively

low in fat and, due to the large amounts of specially designed antibodies present, has a high protein content. In some parts of the world, colostrum is fed once daily to all low-birth-weight babies in hospitals as a biological protection against infection. (AF)

- 4104 Ampofo, O.** *Plants that heal*. World Health (Geneva), Nov 1977, 26-30. Engl.

Also published in Arabic, French, German, Italian, Persian, Portuguese, Russian, and Spanish.

Clinical screening of medicinal plants has often been unsuccessful because traditional practitioners were not involved in the testing procedures; when they did participate, the success rate was at least 50%. The author describes case histories where African herbal remedies have cured or ameliorated postpartum haemorrhage, guinea worm, various skin diseases, diabetes mellitus, and bronchial asthma. Traditional medicines can not only cure diseases for which Western remedies are ineffective but are also an inexpensive substitution for costly, imported drugs. (RMB)

- 4105 Ascoli, W.** *Private health surveillance on Guatemalan farms*. Bulletin of the Pan American Health Organization (Washington, D.C.), 11(2), 1977, 111-116. Engl.

Also published in Spanish in *Boletín de la Oficina Sanitaria Panamericana* (Washington, D.C.), 83(3), 1977.

The procedures, cost, and results of a simple programme of preventive medicine for Guatemalan farm families are described. The 152 inhabitants of 27 households were visited once a month from 1972-1975 and participated in a programme of personal hygiene, waste disposal, infant and prenatal care, and family planning. At an annual cost to the farm owner of US\$8.80, some major health advances made during this period included: latrine construction; insecticide spraying for fleas, lice, and bedbugs; scabies treatment by benzyl benzoate; iron deficiency anaemia treatment with ferrous sulphate; immunization against whooping cough, tetanus, and measles; and a family planning programme for women with two or more children. (FM)

- 4106 Asociacion Latinoamericana de Desarrollo Rural (ALADER), Bogota. Colegio de Postgraduados, Chapingo, Mexico. Preseminario Internacional sobre Mejoramiento del Hogar Rural; memorias.** (Report of the International Seminar on the Improvement of Rural Family Life). Bogota, Asociacion Latinoamericana de Desarrollo Rural (ALADER), Apr 1975. 68p. Span. Preseminario Internacional sobre Mejoramiento del Hogar Rural (para Agricultores de Escasos Recursos), Oaxtepec, Mexico, 3-5 Jun 1974.

Over the past 20 years, numerous programmes aimed at improving the quality of rural life by educating rural women in certain household skills (money management, gardening, crafts, hygiene, etc.) have been initiated in Latin America. This report critically examines such programmes, attempting to clarify the relationship between rural family life and rural development and the

role of women. The 1st part discusses the shortcomings of family improvement programmes to date, particularly their tendency to limit the role of women to that of homemaker when in most rural families the mother is, if not the sole support of the family, at least obliged to make an economic contribution. A new concept in family improvement programmes based on a functional analysis of family life and resources (in terms of actual income, materials, energy, time, knowledge, skills, and routines) is called for. The 2nd part discusses methods of collecting and using basic sociocultural data for family improvement programmes and a number of areas for further investigation are put forward in the recommendations. (HC-L)

- 4107 Assale, G., le Doujet, A.** *Etude des methodes de diagnostic de l'onchocercose a l'occasion d'une enquete dans le village de Bettie. (Study of onchocerciasis diagnostic methods during a survey of the village of Bettie)*. Medecine d'Afrique Noire (Paris), 25(8-9), Aug-Sep 1978, 511-516. Fren. 10 refs.

The authors studied the incidence of onchocerciasis in the southeastern Ivory Coast and compared three different diagnostic methods. Of the 150 subjects examined, 53 had nodules, 92 had dermal microfilariae, and 139 were shown to have antibodies present by immunofluorescence. Nine subjects were negative to all three techniques. The authors conclude that this combination of techniques is almost 100% effective for detecting onchocerciasis and that immunofluorescence alone can be used to determine the endemic level. Measurements of urinary microfilariae and the lowering of visual acuity are also noted. (Modified journal abstract.)

- 4108 Australasian Nurses Journal, Port Adelaide, Australia. Link between nutrition and family planning.** Australasian Nurses Journal (Port Adelaide, Australia), 7(5), Dec 1977, 16. Engl.

In cooperation with the Planned Parenthood Federation of Korea, the World Food Programme and CARE developed a feeding programme for preschool children in day-care centres throughout the country. At the same time, classes offered to mothers emphasized the relationship between good nutrition, family planning, and health. A booklet used in the classes explained the effects of large families on the economy at both the individual and state levels. Along with information on contraception methods and nutrition education, the pamphlet also attempted to change the traditional attitude that every family must have a son. The centres offering these classes reported an 80% success rate in the use of contraception. (FM)

- 4109 Ballard, R.C., Sutter, E.E., Fotheringham, P.** *Trachoma in a rural South African community*. American Journal of Tropical Medicine and Hygiene (Chapel Hill, N.C.), 27(1 Pt.1), Jan 1978, 113-120. Engl. 16 refs.

A sample of 284 family units in a rural South African community was studied for trachoma. Evidence of current or previous infection was found in 82% of the total

population of 1 207, but there was a low prevalence of upper tarsal disease, which is usually acquired in the 1st 3 years of life and has a tendency toward spontaneous cure without complications. Active disease and potentially blinding sequelae were more prevalent in elderly females than in elderly males. Evidence suggested that trachoma is transmitted primarily within households, the main source of infection being preschool children. Statistical data are included. (DP-E)

- 4110 Balslev, K.** *Leprosy and the community; evaluation of the campaign against leprosy in the West Lake region, Tanzania.* *Leprosy Review* (London), 47(3), 1976, 221-234. Engl.

A leprosy eradication programme, begun in the West Lake Region of Tanzania in 1962, was evaluated in 1974. The programme dealt with 6 796 cases, 1 100 of them potentially contagious. With the exception of 120 cases confined to two areas, the disease has been brought under control. The author recommends that control sample surveys be taken in uncontrolled areas to clarify the situation, case-finding campaigns be started in all areas, positive cases be treated with alternative drugs, records be kept for yearly evaluation, and annual targets be set. (DP-E)

- 4111 Bazin, M.L.** *Onchocerciasis; programme without frontiers.* *World Health* (Geneva), Jan 1978, 5-9. Engl.

Also published in Arabic, French, German, Italian, Persian, Portuguese, Russian, and Spanish.

The only practical way of interrupting the cycle of onchocerciasis, or river blindness, is to spray blackfly larvae, which are found in fast-flowing rivers, with insecticide; this action, however, must be taken on a regional basis. In 1973, Benin, Ghana, Ivory Coast, Mali, Niger, Togo, and Upper Volta decided to cooperate in a programme to identify and spray sources of blackfly larvae within 270 000 m² of the Volta River Basin. Once a week, the results of epidemiological surveillance throughout the whole area are radioed to the Ougadougou Vector Control Unit, which alerts a fleet of 10 aircraft based in Ghana and Upper Volta who carry out international insecticide spraying, crossing borders without formality. In addition, the countries exchange data on the location of each focus of river blindness. The programme has so far considerably reduced the density of the blackfly population, improved living conditions, and opened the way for economic development in previously afflicted areas. (HC-L)

- 4112 Bekker G., L.F., Godoy, R.** *Proyecto de salud rural, area de "Las Guanchias" 1974. (Rural health project, "Las Guanchias" area, 1974).* *Revista Centroamericana de Ciencias de la Salud* (San Jose), 1(2), Sep-Oct 1975, 71-90. Span.
Seminario sobre Teoria y Practica de la Medicina Comunitaria en Centroamerica, La Catalina, Costa Rica, 12-16 May 1975.
For complete proceedings see entry 3563.

After a hurricane devastated the northern coast of Honduras in 1974, the University of Honduras organized a 3-month project to provide emergency health services and assist in the medical, socioeconomic, and agricultural recovery of the area. In the health area, research projects and two courses in preventive medicine for 14 students were carried out; project volunteers at five rural health posts cared for 5 000 patients; typhoid, measles, DPT, and polio vaccination coverage was extended to 25%-95% of the at-risk population; 86 community volunteers were trained and deployed; 1 470 tests were conducted at a field laboratory; etc. The project's manpower, resources, and organization are described and its accomplishments evaluated. (RMB)

- 4113 Belcher, D.W., Nichols, D.D., Ofosu-Amaah, S., Wurapa, F.K.** *Mass immunization campaign in rural Ghana; factors affecting participation.* *Public Health Reports* (Rockville, Md.), 93(2), Mar-Apr 1978, 170-176. Engl. 10 refs.

In November 1974, a 4-day mass campaign aimed at immunizing 80% of all preschoolers against measles, pertussis, tetanus, diphtheria, and poliomyelitis was undertaken in the Danfa district of southern Ghana. Post-campaign interviews with respondents from 676 households revealed that: the campaign failed to achieve its target with respect to children aged 0-2 years but achieved satisfactory coverage (80%-86%) of children aged 2-5 years; 92% of the mothers interviewed knew in advance about the campaign; 94% of the respondents were in favour of the campaign; and non-participation was related to insufficient information, competing maternal responsibilities, and distance from the clinic. It is suggested that future campaigns make use of village volunteers to motivate family attendance, charge village leaders with reminding people 1 day in advance of immunization, and stress the need to protect infants and toddlers against measles and whooping cough, since these are well-recognized diseases. (HC-L)

- 4114 Berlin, E.A., Markell, E.K.** *Assessment of the nutritional and health status of an Aguaruna Jivaro community, Amazonas, Peru.* *Ecology of Food and Nutrition* (London), 6(2), 1977, 69-81. Engl. 46 refs.

Assessment of the health status of 117 Aguaruna Jivaro Indians (Peru) by using anthropometric measurements as indicators of growth, fat stores, and muscle development and clinical examination for nutritional deficiencies reveals the adequacy of the traditional diet. Two unanticipated and significant findings resulting from this study were that the prevalence of parasitic diseases was high and the dietary intake was extremely high in bulk and nutrients. The Aguarunas' tolerance for parasites was attributed to the quantity and quality of their diet. A list of cultivated foods is included. (RMB)

- 4115 Beukes, P.J.** *Baragwanath Hospital primary health care project in Soweto.* Soweto, South Africa, Baragwanath Hospital, 24 May 1978. 10p. Engl.
Sixth-ninth Annual Conference of the Canadian

Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978.

Unpublished document.

After the 1976 riots in Soweto, South Africa, the Baragwanath Hospital staff physicians deserted their posts and the hospital was forced to find another way to provide curative services. Consequently, it established the primary health care project, which uses nurses as the principal primary health care workers. The author discusses at some length the role of the nurse, her education and classification, and the primary health care team of which she is a part. Administration and evaluation of the project are considered briefly. The advantages and problems associated with the project are examined and the project's expansion is traced. The paper concludes with an evaluation of the project, which was considered a great success. (DP-E)

- 4116 Brook, R.H., Davies-Avery, A., Greenfield, S., Harris, J., Lelah, T., Solomon, N.E., Ware, J.E.** *Assessing the quality of medical care using outcome measures; an overview of the method.* Philadelphia, Pa., Medical Care, 15(9), Sep 1977, Suppl. 165p. Engl.

This state-of-the-art review of methods for assessing the quality of medical care using the outcome method describes the approach of a 1-year research project to select outcome criteria and develop short-term, disease-specific outcome standards against which the medical care delivered to patients with one of eight conditions can be evaluated. These conditions include asthma, breast cancer, cholecystectomy, juvenile diarrhea and dehydration, ischemic heart disease, osteoarthritis, juvenile otitis media, and tonsillectomy. The methodology of the approach is described and its success evaluated; the authors also make suggestions concerning further research on the outcome method. (Modified journal abstract.)

- 4117 Brooke, G.G., Wheeler, E.F.** *High energy feeding in protein-energy malnutrition.* Archives of Disease in Childhood (London), 51(12), 1976, 968-971. Engl. 28 refs.

A simple, low-cost, high-fat diet based on milk powder and oil produced accelerated growth of lean and adipose tissues and resulted in rapid growth and nutritional rehabilitation in 25 randomly-selected, malnourished Jamaican children within 7 weeks. Care was taken to maintain a sufficient level of protein intake. The authors recommend high-energy feeding as an economical and nutritionally acceptable way of minimizing the hospital stay of children with protein-energy malnutrition. (DP-E)

- 4118 Cabrera, B.D., Arambulo, P.V.** *Malaria in the Republic of the Philippines; a review.* Acta Tropica (Basel, Switzerland), 34(3), Sep 1977, 265-279. Engl. 28 refs.

Malaria is widespread in the Philippines and constitutes a serious obstacle to efforts to open new lands for agricultural development. Since 1966, a programme consisting of residual spraying with DDT twice a year plus complementary casefinding and treatment has been conscientiously maintained in malaria-infested areas. As of 1972, approximately 60% of these areas had reached the vigilance stage, another 20% required only occasional attack measures, and the remaining 20% still required regular attack measures. This paper discusses the parasites and vectors involved, the geographic distribution and prevalence of the disease, and the history of the country's control and eradication measures. Maps and epidemiological data from 1946-1974 are included. (HC-L)

- 4119 Calloway, D.H., Gibbs, J.C.** *Food patterns and food assistance programs in the Cocopah Indian community.* Ecology of Food and Nutrition (London), 5(4), 1976, 183-196. Engl. 17 refs.

The Cocopah Indians of Arizona (USA) are the subject of a comparative study of two food assistance programmes: surplus commodities distribution and food stamps. Following a discussion of the social and economic conditions of the tribe, both programmes are outlined in detail. It was found that the commodities distribution programme tended to reinforce the use of cheap foods lacking in nutritional value. The food stamp programme was plagued by organizational and administrative difficulties that caused the participation rate to fall from 88%-15% in 1 year, despite an extensive outreach effort. Poverty was seen to be the underlying cause of the tribe's poor health. (FM)

- 4120 Chandrasekhar, U., Nandini, S., Devadas, R.P.** *Protein quality and acceptability of CARE's Kerala indigenous food.* Indian Journal of Nutrition and Dietetics (Coimbatore, India), 13(1), Jan 1976, 1-6. Engl.

Three CARE food formulae, Kerala indigenous food (KIF) II, Mod II, and Mod III, based on tapioca and groundnut flour and/or wheat semolina, were tested in five recipes formulated, standardized, and evaluated for their acceptability to 30 Indian children aged 7 years and 30 preschoolers. The KIF samples were also evaluated in terms of weight gain, protein intake, protein efficiency ratio, hepatic weight, nitrogen and fat, and apparent digestibility in further experiments with rats. The results indicate that KIF Mod II has greater nutritional potential and can easily be incorporated into local recipes for use in feeding programmes. Statistical data are included. (DP-E)

- 4121 Chinese Academy of Medical Sciences, Coordinating Study Group on the Physical Development of Children and Adolescents, Peking.** *Chinese Academy of Medical Sciences, Institute of Pediatrics, Peking. Studies on physical development of children and adolescents in new China.* Chinese Medical Journal (Peking); 3(6), Nov 1977, 364-372. Engl.

An anthropometric survey of children aged 0-17 years was carried out in 1975 in the People's Republic of China. Weight, height, sitting height, chest circumference, and head circumference were measured in 273 735 individuals. Analysis of the data indicated that development in Chinese children compared favourably with accepted standards. Significant improvement in developmental patterns of Chinese children since 1949 was evident. Urban children generally showed better development than rural children. Statistical data are included. (DP-E)

- 4122 Chinese Medical Journal, Peking. Anti-Epidemic Medical Workers of Shaokuan Prefecture, Kwangtung, China PR. Diphtheria control by preventive inoculation.** Chinese Medical Journal (Peking), 3(5), Sep 1977, 311-314. Engl.

In the People's Republic of China, of some 15 000 children who received the 1st of three injections of diphtheria-pertussis vaccine in 1962, only 18% completed the series. Immunization efforts were intensified and, in 1963-1965, 9.3% completed the full course of inoculations. The average positive Schick test rate fell from 28.6% in 1963 to 8.4% in 1975 but remained high (about 80%) in children aged less than 2 years, most of whom had not been immunized. In 1958, the diphtheria prevalence rate was 35.4:100 000 population; it fell to 0.4:100 000 in 1965 and no cases have been reported since 1966. (Modified journal abstract.)

- 4123 Chouhan, B.S. Kajal eye staining for early detection of vitamin A deficiency in the field.** Tropical and Geographical Medicine (Haarlem, Netherlands), 29(3), Sep 1977, 279-282. Engl.

Staining the eyes with carbon black (*kajal*) was used to detect eye diseases in 500 rural and urban Indian children aged 1-15 years. Of 280 rural boys, 21.4% took the stain; of 50 girls, 16.0%; the urban results were 5.7% of 88 and 9.7% of 82, respectively. The staining technique revealed all clinically-diagnosed cases of conjunctival xerosis with Bitot's spots and 2.6% of the cases without spots. Eight cases presenting only night-blindness also stained. Since *kajal* application is harmless, cheap, and acceptable to Indian custom, the author recommends it as a diagnostic procedure for use by paramedics in the field. Statistical data are included. (RMB)

- 4124 Colombia, Ministerio de Salud Publica y Asistencia Social. Mortalidad infantil y materna, Colombia, 1975. (Infant and maternal mortality, Colombia, 1975).** Boletín Epidemiológico Nacional (Bogotá), 3(3-4), Jul-Sep 1977, 19-30. Span. 16 refs.

Statistical data on maternal and infant mortality in Colombia are presented and analyzed. The analysis focuses on a breakdown of infant mortality by age and cause, the importance of maternal mortality in female (aged 15-49 years) mortality in general, and the relationship between age and maternal mortality. The principle causes of perinatal mortality (fetal anoxia and hypoxia, pneumonia, birth trauma, and infections contracted *in utero* or shortly thereafter) and maternal

mortality (toxemias, haemorrhages, abortion, etc.) are related to inadequate prenatal and perinatal care while the foremost causes of death during the 1st year of life (respiratory and gastrointestinal ailments) are related to an insanitary environment. (HC-L)

- 4125 Colombia, Secretaria Tecnica del Consejo Superior de Planificacion Economica. Estudio sobre la situacion del nino de 0-6 anos en Honduras. (Study on the situation of the child aged 0-6 years in Honduras).** Bogotá, Secretaria Tecnica del Consejo Superior de Planificacion Economica, Mar 1974. 1v. (various pagings). Span.

Data from 381 families from different social classes and seven locations in Honduras were collected during 1973 for this study. It contains information on the general characteristics of Honduras and the regions studied, the family environment (social relations, marital status of parents, father's occupation, etc.), the children of the families (relationships with siblings, problems, etc.) and projections for their future, the physical environment of the home, and family planning. Maps, a report on child care services in Honduras, and copious statistical data are included in annexes. (RMB)

- 4126 Cowen, D.L., Culley, G.A., Hochstrasser, D.L., Brisco, M.E., Sones, G.W. Impact of a rural preventive care outreach program on children's health.** American Journal of Public Health (New York), 68(5), May 1978, 471-476. Engl. 21 refs.

A modified "tracer disease" methodology for measuring health outcomes has been applied to the evaluation of a rural pediatric outreach preventive health care programme in the Appalachian region of the USA. The general effectiveness of the services provided was assessed by comparing the prevalence of certain common childhood diseases among the children who had received these services and similar children who had not received them. Generally, prevalence rates were similar in both groups. However, it was demonstrated that the programme was effective in early diagnosis and treatment of iron deficiency anaemia. It was noted that the programme children had a less advantaged socioeconomic and environmental background. (DP-E)

- 4127 Cross, J.H., Irving, G.S., Anderson, K.E., Gunawan, S., Sulianti Saroso, J. Biomedical survey in Irian Jaya (West Irian), Indonesia.** Southeast Asian Journal of Tropical Medicine and Public Health (Bangkok), 8(4), Dec 1977, 532-536. Engl.

In July 1972, in response to reports of a cholera outbreak, a biomedical survey was conducted in several areas of Indonesia. Stool specimens, blood smears, and sera were collected and examined for evidence of parasitic and other infectious diseases. In 114 stool samples, the most commonly found intestinal parasites were *Trichuris trichiura* (94%), *Ascaris lumbricoides* (74%), hookworm (58%), *Entamoeba coli* (15%), *Endolimax nana* (8%) and *Entamoeba histolytica* (7%). *Wuchereria bancrofti* microfilariae were detected in 4%

and malaria in 4% of 513 blood smears. Statistical data for these and other test results are included. (DP-E)

- 4128 Cross, J.H., Banzon, T., Wheeling, C.H., Cometa, H., Lien, J.C., Clarke, E., Petersen, H., Sevilla, J., Basaca-Sevilla, V.** *Biomedical survey in North Samar Province, Philippine Islands.* Southeast Asian Journal of Tropical Medicine and Public Health (Bangkok), 8(4), Dec 1977, 464-475. Engl. 21 refs.

A biomedical survey was carried out in North Samar Province, Philippines, to update information on the prevalence of parasitic and other infectious diseases. The highest rates for intestinal parasites in 1 394 stool specimens were: *Trichuris trichiura* (90%), *Ascaris lumbricoides* (78%), and hookworm (65%). In 1 859 blood smears, microfilariae of *Wuchereria bancrofti* were detected in 4%, while malaria was found in none. Of 994 sera samples tested for antibodies to *Schistosoma japonicum*, 65% were considered positive. Statistical data for these and other test results are included. (DP-E)

- 4129 de Guevara C., L.L.** Honduras, Patronato Nacional de la Infancia. *Informe final, tomo II: principales resultados y conclusiones. (Final report, volume 2: principal results and conclusions).* Tegucigalpa, Patronato Nacional de la Infancia, Estudio del Nino, Apr 1975. 1v.(various pagings). Engl. 31 refs.

The results of a demographic and health survey of Honduras are presented. Researchers studied the living conditions, occupation, educational level, income, and matrimonial status of the inhabitants of both urban and rural areas. Sanitary conditions in the home, utilization rates for health services, and the health status of children aged 15 years or less were also examined and mental health was evaluated by means of psychometric tests and a study of social deviations. Suggestions for improvement are made and statistical data are included in an annex and throughout the text. (RMB)

- 4130 de Leon, E.M., Baltazar, A.C., Magbitang, J.** *Short studies on some anthropometric parameters in assessing nutritional status.* Philippine Journal of Nutrition (Manila), 28(1-2), Jan-Jun 1975, 15-17. Engl.

In an effort to replace weight scales with a simpler instrument for assessing childhood nutritional status, health workers in the Philippines tested the accuracy of arm circumference/height measurements in identifying malnourished children. One-hundred-and-five children aged 0-72 months were classified into nutritional levels on the basis of Jayme's weight standard and Morley's arm circumference standard and the results compared. In a 2nd study, 336 children aged 1-6 years were grouped according to their age and nutrition status by weight and a statistical test on the differences of mean arm circumference/height ratio of each nutritional level was conducted. The results of the 1st test revealed that many children who were classified as malnourished using weight as an index were considered normal with arm

circumference as the parameter. The 2nd revealed no appreciable difference in the arm circumference/height ratios that could be attributed to level of nutrition. It is concluded that neither arm circumference nor arm circumference/height can be reliably used as indicators of nutritional level among Filipino children. Data from the two studies are set forward in five tables. (HC-L)

- 4131 Delgado, H.** Instituto de Nutricion de Centroamerica y Panama, Division de Desarrollo Humano, Guatemala. *Nutricion, crecimiento y desarrollo. (Nutrition, growth, and development).* Boletin de la Oficina Sanitaria Panamericana (Washington, D.C.), 78(1), Jan 1975, 38-51. Span. 16 refs.

As part of a long-term investigation into the effects of moderate malnutrition on child growth and mental development and fertility, maternal and child health was monitored over a 4-year period in rural Guatemalan communities whose inhabitants received a protein-calorie and a low-calorie supplement, respectively. It was observed: that mothers in the 1st (well-supplemented) group gave birth to half as many low-birth-weight babies as those of the 2nd (poor-supplemented) group; that a direct correlation between weight at birth and mental and psychomotor performance at age 6 months existed; that heights and weights of children aged up to 7 years were significantly higher in the 1st group; and that mothers in this group evidenced shorter periods of postpartum amenorrhea, and consequently shorter birth intervals, than those of the poorly-supplemented group. The implications of these findings for public health are discussed. (HC-L)

- 4132 Devadas, R.P., Chandrasekhar, U., Vasanthamani, G., Gayathri, V.** *Evaluation of a mixture based on sunflower meal, Bengal gram flour and sesame on school children.* Indian Journal of Nutrition and Dietetics (Coimbatore, India), 14(10), Oct 1977, 291-295. Engl.

The protein quality of a mixture of sunflower meal, maize, roasted Bengal gram flour, and sesame meal (65:15:10:10) was evaluated by means of a 5-month growth study of 100 schoolchildren and a 14-day nitrogen retention study of 8 children aged 9-10 years in Coimbatore, India. It was observed that the increases in heights and weights of children fed the sunflower meal mixture were significantly higher than those of the control group, who received a maize and green gram dahl mixture commonly used as a food supplement; also, the mean retention rate of nitrogen in the children who consumed the experimental diet was significantly greater than that of those who ate a low-protein basal diet. The authors conclude that the sunflower meal mixture, which costs less than the maize and green dahl mixture, provides a better protein supplement to the diets of schoolchildren in particular and the population in general. (HC-L)

- 4133 Devadas, R.P., Kamalanathan, G., Kandiah, M., Kupputhurai, U.** *Studies on Special Nutrition Programme (SNP) III: "spot feeding" vs "take home*

feeding." Indian Journal of Nutrition and Dietetics (Coimbatore, India), 14(7), Jul 1977, 193-197. Engl.

In a nutrition programme held at 18 nutrition centres in Coimbatore (India), 30 children (Group A) were given three daily slices of bread to eat on the spot while 30 other children (Group B) were given three daily slices of bread to take home. Every month for 6 months the groups were compared to each other and to a 3rd group of children (Group C) who had taken no part in the programme. It was found that Group A had greater increases in height, weight, and haemoglobin levels than Group B, possibly because the latter were forced to share their bread with siblings at home, and both groups outstripped Group C. Groups A and B also rated higher in a clinical assessment of the nutritional status of the children and a weight survey revealed that the feeding programme helped alleviate nutrient deficiencies. Statistical data are included. (DP-E)

- 4134 Devadas, R.P., Kamalanathan, G., Kuputhal, U.** *Studies on the special nutrition programme (SNPI): background information on the beneficiaries under SNP.* Indian Journal of Nutrition and Dietetics (Coimbatore, India), 14(3), Mar 1977, 61-64. Engl.

The Special Nutrition Programme, financed by the government of India, has supplied 75 grams of fortified bread daily to children aged 6-36 months in urban slums since 1970. In a 1977 evaluation of the programme, family backgrounds, dietary patterns, clinical status, height, and weight of 308 beneficiaries were ascertained. Most of the families had little income or education. Diets were inadequate, although more than 60% of family income was spent on food, mainly cereals. Calorie and protein intakes were below recommended allowances. Nevertheless, only five children (1.3%) showed signs of kwashiorkor, although 36% had eyesight problems and 20% had bleeding gums and mottled enamel. Heights and weights were all below standard. (DP-E)

- 4135 Echeverry, G.** *Descripcion del programa rural de planificacion familiar. (Description of a rural family planning programme).* Bogota, PROFA-MILIA, Dec 1974. 35p. Span.

This rural family planning programme is based on training local people as motivators, promoting non-clinical methods (condoms, tablets, and pills), distributing supplies through local volunteers, utilizing the local infrastructure as an information network, and simplifying record-keeping and administration. Evaluation of the programme, after over 3 years of operation in 370 Colombian communities, attests to the validity of this approach and to the receptivity of the rural population to family planning. This document describes in detail the programme's methodology, including samples of the reports and forms used in its administration. (HC-L)

- 4136 Ecuador, Secretaria Tecnica del Comité de Políticas Nacionales de Alimentación y Nutrición.** *Informe del Ecuador. (Report of Ecuador).* Quito, Secretaria Tecnica del Comité de Políticas

Nacionales de Alimentación y Nutrición, 1973. Iv.(various pagings). Span.

Primera Conferencia Subregional del Proyecto Interagencial de Políticas Nacionales de Alimentación y Nutrición, Lima, Peru, 9-15 Jul 1973.

In this conference report, the nutritional status of Ecuador is analyzed in terms of food supply and demand, demographic data, and nutrition manpower. The objectives, strategies, and means of implementation of Ecuador's 1973-1977 national development plan are examined with regard to the agricultural and fishing sectors, water and waste disposal, education, and health. Possibilities for international technical and financial aid are discussed and existing nutrition programmes and activities are evaluated. Copious statistical data are included. (RMB)

- 4137 Espinosa de Restrepo, H., Ramirez S., G., Ospina de Arboleda, G.** *Panorama epidemiológico de enfermedades transmisibles en la ciudad de Medellín — Colombia. (Epidemiological survey of transmissible diseases in Medellín, Colombia).* Antioquia Medica (Medellin, Colombia), 26(6), 1976, 405-426. Span.

Epidemiological data collected in Medellín, Colombia, from 1957-1972 reveal that the incidence of diarrhea and gastroenteritis has declined, with a greater reduction in mortality than in morbidity, although they both remain a serious problem. Immunization has not been effective in controlling diphtheria, tetanus, poliomyelitis, measles, or whooping cough. Pulmonary tuberculosis has decreased except among underfives. Venereal disease control has become progressively less effective in urban areas. The authors emphasize the need to find new disease control strategies. (RMB)

- 4138 Fisher, M.M.** *Growth of Zambian children.* Transactions of the Royal Society of Tropical Medicine and Hygiene (London), 70(5-6), 1976, 426-432. Engl. 10 refs.

Severe malnutrition causes death and retarded growth in many Zambian children. As the onset of malnutrition is gradual and often escapes notice, a study aimed at identifying early recognizable signs was devised. Two-hundred-and-five Zambian copper miners' children were measured at age 1 year and 163 of the original sample at age 18 months. Their mean weight, height, triceps skin-fold, arm circumference, and developmental progress were often less than expected and the slower growth corresponded significantly with lower development scores. The mid-upper-arm circumference is the easiest and cheapest measurement to make and it compares closely with other measures. Statistical data are included. (DP-E)

- 4139 Florentino, R., Picar, B.** *Report on the use of the bar scale for field weighing of pre-schoolers.* Philippine Journal of Nutrition (Manila), 28(1-2), Jan-Jun 1975, 10-11. Engl.

With a view to finding an inexpensive yet reliable scale for use in Operation Timbang, Philippines, a locally-manufactured bar scale was tested using a clinical scale

as a standard. The scale has a capacity of 20 kg, with 0.1 kg markings, and was adapted for the weighing of preschoolers by the addition of a crib measuring 10 by 16 inches. The scale reading was then corrected by remarking the scale on a piece of tape that was placed over the original markings. One hundred and ninety-two preschoolers were weighed on both the adapted and the clinical scale with these results: 94 (49%) evidenced exactly the same weights with both scales, 128 (66%) evidenced weights within 0.1 kg of each other, the largest discrepancy between the scales was 4 kg, the average discrepancy was 0.049 kg, and 97% of the subjects were classified within one nutritional level (out of 10) using the two scales. It is concluded that, for the purpose of screening children broadly into levels of nutrition, the adapted bar scale can be used as long as proper care is exercised. It is recommended, however, that the crib be enlarged to 14 by 16 inches. An illustration of the scale, with crib, is included. (HC-L)

- 4140 Foster, S.O.** *Participation of the public in global smallpox eradication.* Public Health Reports (Rockville, Md.), 93(2), Mar-Apr 1978, 147-149. Engl.

See also entries 4096 and 4097.

The author attributes the almost worldwide eradication of smallpox to public participation in detection and treatment activities. When, in 1967, it became apparent that mass immunization programmes were ineffective, a new strategy known as surveillance-containment was developed in Nigeria. The author describes the success in Bangladesh and India of this strategy in a mass campaign against smallpox, which required the retraining and reorientation of health workers and an outreach programme involving market and house-to-house searches with follow-up vaccination programmes. The public was encouraged to participate in these searches and to report outbreaks voluntarily. (RMB)

- 4141 Gangadharan, M.** *School health service programme in Kerala; a rural study.* Indian Pediatrics (Calcutta, India), 14(8), Aug 1977, 603-613. Engl. 14 refs.

In a rural area of India, 2 091 primary school children and the environmental conditions of their three village schools were examined. Results revealed that many of the children had not been properly vaccinated and many also suffered from malnutrition (34.19%), vitamin deficiencies (9.42%), worm infestations (11.81%), anaemia (25.25%), and dental caries (13.68%). One of the schools had poor ventilation and lighting, while two had poor sanitary facilities. Health and nutrition education of parents, teachers, and students, supplementary feeding programmes, immunizations, and periodical medical examinations together with improvement of sanitary conditions are needed to protect the health of the children. Statistical data are included. (DP-E)

- 4142 Ghosh, S., Yayathi, M., Yayathi, T.** *Quick nutritional screening by midarm circumference or a bangle.* Indian Pediatrics (Calcutta, India), 13(12), Dec 1976, 915-918. Engl.

A plastic bangle bracelet with a known circumference provides a simple, reliable, and fast method of measuring midarm circumferences to determine the degree of malnutrition in children aged 1-5 years. This test was applied to 563 children attending the outpatient department of Safdarjang Hospital in New Delhi and to 203 attending the nutrition clinic. If the bangle passed up the arm easily and did not compress the adjacent tissues, the test was considered positive. In this way, 96% of 3rd degree malnutrition was detected and 57.5% of 2nd degree. This simple screening process could be useful in nutrition supplement programmes for cases from moderate to severe malnutrition. (FM)

- 4143 Giraldo Samper, D.** *Asociacion Colombiana de Facultades de Medicina, Bogota. Migracion interna y salud en Colombia. (Internal migration and health in Colombia).* Bogota, Asociacion Colombiana de Facultades de Medicina, Division de Medicina Social y Poblacion, Nov 1976. 174p. Span.

This monograph reports and analyzes the findings of a study undertaken in Colombia to clarify the relationship between health and development. The study focuses on two economically-depressed agricultural areas that are rapidly losing population to the city of Bogota. It examines morbidity and mortality rates and rates of utilization of health services in the two areas, comparing them with similar rates for Colombians in general and immigrants from one of the areas in particular. Significant improvements in the disease pattern of the immigrants after moving to Bogota are attributed to better socioeconomic conditions and increased access to health, including preventive services. Ninety-six tables of data are included. (HC-L)

- 4144 Gore, A.P., Tilve, S., Kulkarni, M.** *Nutritional status of tribes in the Indravati River Basin.* Indian Journal of Nutrition and Dietetics (Coimbatore, India), 14(6), Jun 1977, 167-172. Engl. 11 refs.

Some 52 families in an unspecified number of villages in India were interviewed to determine the existing patterns of diet, nutrient intake, and health. Findings of the survey showed that the diet consists mainly of two cereals, mandia and rice, reflecting the general poverty of the villagers. Diets were found to be deficient in calories but not in essential amino acids. Weights were below standard; heights were normal. Traditional medicine did not play an important role in the life of the villagers. Statistical data are included. (DP-E)

- 4145 Gunardi, A.S.** *Tuberculosis and its control in Indonesia.* Paediatrica Indonesiana (Jakarta), 15(11-12), Nov-Dec 1975, 315-332. Engl.

When a 1962-1965 WHO survey revealed a tuberculosis-sensitivity rate of 40.6% among Indonesian children aged 10-14 years and a bacteriologically-confirmed infection rate of 0.6% and an incidence of pulmonary shadows of 3.6% among the population at large, a 5-year national tuberculosis campaign (Pelita I) was launched. The campaign aimed to reduce the incidence

and prevalence of tuberculosis by vaccinating without preliminary tuberculin testing all children aged up to 14 years, providing free treatment for all bacteriologically-confirmed cases, and distributing educational materials (flash-cards and leaflets) to local leaders. Vaccinations were given by mobile teams of smallpox/BCG vaccinators, while treatment was limited to those presenting at the country's health centres. By the end of the campaign, 80% of the target group in Bali and Java and 60% of the target group in other areas of the country had received BCG vaccinations and an estimated 35 000 persons were undergoing treatment. The aims and methodology of the 2nd control programme, Pelita II, are similar to those of Pelita I, except that BCG vaccinations will be administered more selectively, i.e., to children aged 12-13 and 0-1 years, and only primary vaccination is to be performed (revaccination will be the aim of Pelita III). Health education efforts aimed at persuading persons with symptoms to seek treatment are being intensified and efforts to track down treatment defaulters will be increased. Results of the national tuberculosis survey are set forward in a number of graphs, charts, and tables. (HC-L)

- 4146 Hogan, R.C., Broske, S.P., Davis, J.P., Eckerson, D., Epler, G., Guyer, B.J., Kloth, T.J., Kolff, C.A., Ross, R., Rosenberg, R.L., Staehling, N.W., Lane, J.M.** *Sahel nutrition surveys, 1974 and 1975*. Disasters (Oxford, UK), 1(2), 1977, 117-124. Engl.

The results of three nutrition surveys carried out in 1974 and 1975 on the rural, sedentary population of the Sahel are presented and compared. In accordance with the survey methodology, children aged 6 months-6 years were selected as the most sensitive indicators of acute malnutrition. Statistical data for each country on malnutrition, mortality, relief supplies, and food reserves show that maintenance and carefully distributed food supplies are more important than constant, year-long assistance. The problem of malnutrition was found to be particularly serious in Chad and Upper Volta, where needs should be closely monitored in the future. (FM)

- 4147 Jordan, P., Unrau, G.O.** *Simple water supplies to reduce schistosomiasis*. Tropical Doctor (London), 8(1), Jan 1978, 13-18. Engl. 10 refs.
Also published in AFYA (Nairobi), 12, Jan-Feb 1978, 5-12.

In St. Lucia, West Indies, an experimental water supply to households and communal laundry-shower units proved effective in reducing the incidence of schistosomiasis. Acceptance of the laundry units meant that children accompanying their mothers to the washing site were no longer in contact with the polluted waters of rivers and ponds. Other factors regarding water sources, storage, treatment, and distribution relevant to reducing the transmission of schistosomiasis are examined. For example, the supply should be gravity-fed and large enough to last the dry season. Recommended chlorine dosages are given and the importance of controlling water wastage is emphasized. Proper maintenance and sanitary habits are also discussed. (FM)

- 4148 Joseph, M.V.** *Health problems in rural school children; a new look at them*. Indian Pediatrics (Calcutta, India), 14(4), Apr 1977, 243-246. Engl.

Analysis of health data on 3 900 rural Indian children revealed that over 60% of morbidity was caused by relatively simple problems such as deficiencies of iron and vitamins and skin diseases, including scabies and pyoderma. Growth failure was also endemic. The high incidence of dental caries and periodontal illnesses was attributed to poor dental hygiene. The children's teachers were closely involved in the examination and learned how they could play a vital role in a school meal programme and in primary curative treatment of common ailments. Statistical data are included. (DP-E)

- 4149 Kielmann, A.A., McCord, C.** *Weight-for-age as an index of risk of death in children*. Lancet (London), 10 Jan 1978, 1247-1250. Engl. 8 refs.

From April 1968-May 1973, the Department of International Health of Johns Hopkins University (Baltimore, Maryland, USA) studied the effects of the interaction of nutrition and infection in 14 villages in the Punjab, north India. Serial anthropometric measurements (used as an index of nutritional status) and vital statistics of almost 3 000 children aged 1-36 months showed that, on the average, child mortality doubled with each 10% decline below 80% of the Harvard weight median. The relation between season and mortality showed that mortality rates were highest just before and during the main (wheat) harvest, reflecting the effects of food scarcity, relative child neglect, and climate on child deaths among those already underweight. (Modified journal abstract.)

- 4150 Kielmann, A.A., Uberoi, I.S., Chandra, R.K., Mehra, V.L.** *Effect of nutritional status on immune capacity and immune responses in pre-school children in a rural community in India*. Bulletin of the World Health Organization (Geneva), 54(5), 1976, 477-483. Engl. 19 refs.

Also published in French and Russian.

A study of 223 preschool children in nine villages in Punjab, India, attempted to determine the relationship between low body weight caused by malnutrition and a decrease in immune response, specifically to tetanus immunization. Increases in tuberculin sensitivity after BCG inoculation were lowest in the underweight group. Levels of tetanus antibody production were not affected by nutritional status. In general, selected indicators of immune capacity — tuberculin sensitivity, leucocytic blast cell transformation, and levels of sera IgA and C — were significantly reduced in a large proportion of normally active children. From 10%-20% of the study group were at or below a nutritional level associated with diminished immune capacity. (FM)

- 4151 Kim, I.D., Kim, S.D.** *Supplementary study on the maternal depletion and child malnutrition in certain underprivileged rural area of Korea*. Seoul Journal of Medicine (Seoul), 17(2), Jun 1976, 96-114. Engl. 29 refs.

In a May 1975 survey of Korean villagers, the authors examined 64 pregnant women, 150 lactating women, and 275 preschool children by clinical, anthropometric, and biochemical measurements. Results revealed that 37% of the women were underweight and that pregnant women exhibited more symptoms of protein-calorie malnutrition, anaemia, and osteodysplasia. The mean weights of the children were below accepted Korean standards; 7.6% of infants and 3.3% of toddlers had marasmus and many more showed isolated signs of kwashiorkor. The results are summarized as statistical data. (RMB)

- 4152 Klein, R.E., Arenales, P., Delgado, H., Engle, P.L., Guzman, G., Irwin, M., Lasky, R., Lechtig, A., Martorell, R., Mejia Pivaral, V., Russell, P., Yarbrough, C.** *Effects of maternal nutrition on fetal growth and infant development.* Bulletin of the Pan American Health Organization (Washington, D.C.), 10(4), 1976, 301-316. Engl. 15 refs.

Results of a survey in four Guatemalan villages where pregnant women were offered a protein-containing or a protein-free calorie supplement reveal that women taking less than 20 000 extra calories per pregnancy were twice as likely to produce small babies; they also had more stillbirths and greater infant mortality. The authors point out that it was the calorie and not the protein content of the supplement that was important. The supplement was also offered to 1 083 children; growth retardation was greatest among those receiving less than 5 000 supplemental calories per quarter and was progressively reduced as the amounts consumed increased. Performance on psychological tests also improved among supplemented children. The authors urge continued testing to ascertain whether or not these physical and mental advantages are maintained during later development. (Modified journal abstract.)

- 4153 Komalarini, S., Adisuwirjo, K., Sanborn, W.R.** *Diarrhoeal disorders of bacterial origin in Jakarta.* Southeast Asian Journal of Tropical Medicine and Public Health (Bangkok), 8(4), Dec 1977, 447-451. Engl. 16 refs.

In Jakarta, Indonesia, from April 1974-February 1976, 948 children with gastroenteritis were studied after admission to Sumber Waras hospital. Aetiological agents were identified in 43% of these patients including *Vibrio E1 To 273* in 67% of the cases and *Salmonella enteritidis* in 16%. The overall mortality was 3%; mortality was greater among children with dehydration and malnutrition, but multiple infections had no apparent effect upon a patient's prognosis. Hospitalization averaged 7 days. Seasonal increases in gastroenteritis were noted. Statistical data are included. (DP-E)

- 4154 Kouznetsov, R.L.** *Malaria control by application of indoor spraying of residual insecticides in tropical Africa and its impact on community health.* Tropical Doctor (London), 7(2), Apr 1977, 81-91. Engl. Refs.

An evaluation is made of past experiences in using insecticides to control malaria in tropical Africa. Indoor spraying was initiated as early as 1911 and is credited with controlling malaria epidemics in South Africa in the 1930s. Large-scale house-spraying programmes using DDT and BHS were supported by WHO and UNICEF in the 1950s. However, increasing opposition to insecticides led to the abandonment of spraying operations. In recording the effects of spraying on malaria control in different areas of tropical Africa, the report concludes that insecticides are effective, contribute to a lower mortality rate, and should be part of any malaria control and eradication programme. (FM)

- 4155 Kusin, J.A., Parlung Sinaga, H.S., Marpaung, A.M.** *Xerophthalmia in North Sumatra.* Tropical and Geographical Medicine (Haarlem, Netherlands), 29(1), Mar 1977, 41-46. Engl. 8 refs.

A 1974 survey was carried out in 4 villages, 1 town, and 1 rubber estate in North Sumatra, Indonesia, to determine the prevalence of xerophthalmia in its various stages. By means of a simple, reliable eye-staining technique, 1 754 preschool children were clinically examined. A higher prevalence of xerophthalmia was found among the village subjects, which indicates that the disease should be considered of public health importance in that area. The techniques employed are discussed at some length. Statistical data are included. (DP-E)

- 4156 Maichuk, Y.F.** *Trachoma control in Ethiopia.* Revue Internationale du Trachome (Marseille, France), 1975, 83-123. Engl., Fren. 21 refs.

Between 1955-1958, Ethiopian trachoma morbidity surveys revealed a national incidence of over 60%, especially among schoolchildren. Mass campaigns focused on casefinding in the schools, where active cases were treated by teachers and older pupils; in severely-affected areas, however, the majority of the population was examined by home visitors and treated by a responsible family member. In addition, field trials of trachoma vaccine were carried out in different population groups. Since then, the programme has concentrated on integrating trachoma control into the normal routine of rural health centres and casefinding and treatment have been limited to patients with the disease. Surveys conducted during the early 1970s indicated that initial successes in the control of the disease have not been maintained; although there was some improvement, trachoma remains a public health problem in Ethiopia. Some suggestions for making the campaign more effective are put forward. (HC-L)

- 4157 Margo, G.** *Assessing malnutrition with the mid-arm circumference.* American Journal of Clinical Nutrition (Bethesda, Md.), 30(6), Jun 1977, 835-837. Engl. 12 refs.

Results of various studies using mid-arm circumference (MAC) to assess protein-energy malnutrition in children are compared to the results of surveys based on weight-for-age data. Although MAC is a convenient measure in field conditions and in crisis situations where

many children must be assessed rapidly, its error rate is high and can lead to over- or under-diagnosis. In three South African studies of 621 children aged 13-60 months, a malnutrition rate of 22.7% was obtained using weight-for-age in contrast to the 7.8% diagnosed using MAC. Moreover, MAC failed to diagnose malnutrition in 70.2% of the cases, although its false-positive rate was only 1.3%. (FM)

- 4158 Matthews, C.M., Benjamin, V., Samikkannu, K.C., Punithavithy, D., Palocaren, A.** *Education to overcome malnutrition in rural preschool children.* International Journal of Health Education (Geneva), 20(4), Oct-Dec 1977, Suppl., 2-19. Engl. 11 refs.

Based on census data and the results of a survey of child health and parental attitudes in both the experimental and a control area, a health education project was undertaken in rural India to develop and test a method of motivating parents to adopt a recommended diet for their preschool children. Project workers: identified community leaders and organized discussion groups; launched an educational campaign using films, group discussions, and various teaching aids; distributed weight charts and weighed children monthly; visited underweight children and instructed their mothers; admitted severely malnourished children, with their mothers, to the rural hospital; started nursery schools where cheap, nourishing, locally-available food was distributed free of charge; carried out an immunization programme; and encouraged village industry and handicrafts to increase the earning power of the poorest parents. After 2 years, a final survey revealed improvements in child weights and mothers' knowledge in the project area, as well as immunization coverage of 80%-90%, improved attendance at and support for the nursery schools, and considerable improvement in the appearance of the poorest nursery school attenders. Efforts to introduce village industry, however, were disappointing and it was concluded that they require more time than was available during the project period. The last part of the paper describes a nutrition programme that could be funded by the profits from a local milk cooperative. (HC-L)

- 4159 McKee, D.P., Faine, R.C., Murphy, R.F.** *Effectiveness of a dental health education program in a nonfluoridated community.* Journal of Public Health Dentistry (Raleigh, N.C.), 37(4), Fall 1977, 290-299. Engl. 38 refs.

A 1972 dental health education programme in a non-fluoridated community aimed at reducing the incidence of dental caries through the control of dental plaque by daily toothbrushing and flossing did not produce any apparent difference between the study and control groups of children. This was attributed to the drastic reduction of children remaining in the control group, the relatively advanced age of the subjects, and the short duration of the programme. It was also learned that the majority of the children in both groups had received applications of topical fluoride during the programme period. Such studies should be done on younger

children and parental involvement should be stressed. Statistical data are included. (DP-E)

- 4160 Mora P., J.O., Pardo T., F., Samper de Paredes, B., Ortiz, N., Labrador, L.I.** *Nutricion y desarrollo humano. (Nutrition and human development).* n.p., 1973. 17p. Span. 34 refs.

Primer Seminario Nacional Intersectorial de Alimentacion y Nutricion, Palmira, Colombia, 9-12 Dec 1973.

Unpublished document.

This paper reviews the results of recent research, conducted in Colombia and other parts of the world, into the effects of childhood malnutrition on physical growth, the development of the central nervous system, mental development, learning ability, and scholastic performance. It also briefly describes a longitudinal study that is currently being conducted by the *Instituto Colombiano de Bienestar Familiar*, Bogota, in order to shed some light on the relative importance of nutritional deprivation and negative social factors in intellectual retardation and to provide the basis for designing methods of preventing both phenomena among disadvantaged and marginal groups. Eight tables of data are included. (HC-L)

- 4161 Mora, J.O., Paredes, B. de, Suescun, J., Navarro, L. de** *Prevalencia de la desnutricion infantil en el sur de Bogota. (Prevalence of infant malnutrition in southern Bogota).* Revista de Planeacion y Desarrollo (Bogota), 9(2), Apr-Jun 1977, 79-87. Span. 12 refs.

A sample of 729 preschoolers from a poor suburb in Bogota, Colombia, were examined for evidence of malnutrition. The children's weight-for-age indicated that: 41.4% were suffering from 3rd degree, 9% from 2nd degree, and 1.2% from 1st degree malnutrition; that the frequency of malnutrition rose from 40.2% in families with one preschooler to 85% in families with four preschoolers; that slightly more girls than boys were malnourished; and that the findings of this study were virtually the same as those of an earlier one conducted in 1968. It is concluded that malnutrition remains a serious problem in Bogota, affecting over 50% of the preschool population in the lower socioeconomic strata. (HC-L)

- 4162 Mora, J.O., Paredes, B. de, Wagner, M., Navarro, L. de, Suescun, J., Christiansen, N., Herrera, M.G.** Colombia, Ministry of Public Health and Social Welfare, Instituto Colombiano de Bienestar Familiar-Harvard-Giessen Research Project on Malnutrition and Mental Development. *Nutritional supplementation and the outcome of pregnancy in Colombian women; preliminary report on birth weight.* Bogota, Ministry of Public Health and Social Welfare, Instituto Colombiano de Bienestar Familiar-Harvard-Giessen Research Project on Malnutrition and Mental Development, 1974. 8p. Engl.

Fourth Western Hemisphere Nutrition Congress,

Bal Harbour, Fla., 19-22 Aug 1974.

Unpublished document.

As part of a longitudinal research project on malnutrition and intellectual development, pregnant women from disadvantaged barrios in Bogota, Colombia, were randomly assigned to six experimental groups. All six groups were given a uniform health care programme while two were given nutritional supplements from approximately the 6th month of pregnancy as well. Preliminary findings pertaining to the 1st 252 women enrolled in the study indicate significant differences in the mean birthweights of their babies: 3 035 g for supplemented and 2 946 g for unsupplemented women. This paper tabulates the findings of the study and cites data that suggest that the differences in birthweight are, in fact, due to the supplementation programme and not to other factors. (HC-L)

4163 Mphahlele, M. *Challenge of obstetrics in a developing country.* South African Medical Journal (Capetown), 51(19), 7 May 1977, 680-682. Engl.

From May 1975-May 1976, a study of the quality of obstetrical patient care was carried out in the maternity wing of the Princess Marina Hospital in Botswana. At the time of admission, 278 patients out of 2 196 were identified as requiring special care and they formed the basis of the study group. Statistics revealed a decrease in the caesarean section rate from 30.7%-3.05% in the study period. This dramatic fall was due largely to the admitting medical officers' improved diagnostic skills and greater experience in African obstetrics. Preeclampsia, a bad obstetric history, and venereal disease were and remain the most commonly encountered problems. The three deaths in the group were all preventable and caused by either inexperience or poor transport and communication facilities. (FM)

4164 Nagpaul, D.R., Baily, G.V., Prakash, M., Samuel, G.E. *Prevalence of symptoms in a south Indian rural community and utilization of area health centre.* Indian Journal of Medical Research (New Delhi), 66(4), Oct 1977, 635-647. Engl.

A survey of 6 705 villagers and 4 639 outpatients was undertaken in southern India to determine the symptom profile among the population served by a primary health centre (PHC), the symptom profile among the PHC attenders, and the quality of care offered by the PHC. Percentage of patients visiting the PHC for follow-up was taken as one indicator of the quality of care. From the data collected, the authors concluded that the sickness profile in the PHC did not match that observed in the catchment area and that the quality of care offered in the PHC — as evidenced by the low percentage (28.7%) of revisits — needed improvement. Also, the fact that people aged 45 years and older and patients with coughs were under-represented at the PHC had serious implications for tuberculosis control and required further investigation. (HC-L)

4165 Neufeld, P.D., Katz, L. *Comparative evaluation of three jet injectors for mass immunization.* Canadian Journal of Public Health (Toronto, Ont.), 68(6), Nov-Dec 1977, 513-516. Engl. 13 refs.

Three jet injectors, the Ped-O-Jet, Med-E-Jet, and Medi-jector, were evaluated for suitability in a mass immunization programme. The Ped-O-Jet is powered by a hydraulic foot pump, the Med-E-Jet by compressed carbon dioxide, and the Medi-jector by a hand-operated crank. All were judged to deliver acceptable, accurate doses of medication. The Med-E-Jet was considered easiest to operate but is dependent on a source of compressed carbon dioxide. The Medi-jector is slowest and most complicated to operate. However, due to its compact size and portability it may be suitable as an auxiliary injector in a large programme. (Modified journal abstract.)

4166 Nicholas, D.D., Kratzer, J.H., Ofosu-Amaah, S., Belcher, D.W. *Is poliomyelitis a serious problem in developing countries? — the Danfa experience.* British Medical Journal (London), 16 Apr 1977, 1009-1012. Engl. 25 refs.

Children were examined for lameness in the Danfa Project district of rural Ghana to assess the impact of endemic poliomyelitis and to test a widely held hypothesis that paralytic poliomyelitis is relatively rare in such districts (less than 1:1 000 children affected). The observed prevalence of lameness attributable to poliomyelitis was 7:1 000 school-aged children and the annual incidence is estimated to be at least 28:100 000 population. Although no evidence for an epidemic was found, these rates are comparable to those in the USA and Europe during the years of severe epidemics and indicate that a high price is being paid in the Danfa district for the natural acquisition of immunity. As a result, immunization against poliomyelitis has been given high priority. A teacher questionnaire was also tested for use in postal surveys as a rapid means of estimating the prevalence of lameness attributable to poliomyelitis in countries with a reasonable network of primary schools. (Journal abstract.)

4167 Nugroho, G., Elliott, K. *Dana Sehat programme in Solo, Indonesia.* Proceedings of the Royal Society of London (London), 199(1134), 19 Oct 1977, 145-150. Engl.

Royal Society Discussion of Technologies for Rural Health, London, UK, 9-10 Dec 1976.

In 1963, the Indonesian city of Solo was chosen for the trial of a community health programme financed by monthly subscriptions from the community. A citizens' committee selected by the inhabitants was responsible for planning and volunteer teachers, farmers, and shopkeepers working as health promoters participated in preventive work, health and nutrition education, and the treatment of simple cases. Professional health workers were available for consultation and for referral of serious cases. The programme participants soon initiated

additional environmental improvements and agricultural projects that led to better community health. (DP-E)

- 4168 Nwuga, V.C.** *Effect of severe kwashiorkor on intellectual development among Nigerian children.* American Journal of Clinical Nutrition (Bethesda, Md.), 30(9), 30 Sep 1977, 1423-1430. Engl. 27 refs.

In Nigeria, a sample urban group of school-age children with diagnosed kwashiorkor and four control groups consisting of siblings, an upper-class group, a lower-class group, and a rural kwashiorkor group were given psychological tests to measure intellectual abilities. The sample group had lower levels of certain skills, especially the higher cognitive skills, than their siblings and the other control groups, except their rural counterparts. Boys tended to be more affected by severe kwashiorkor than girls. The upper-class group was superior in weight and height measurements as well as in the various measures of intellectual abilities. The contribution of other factors besides malnutrition to these results is acknowledged. (Modified journal abstract.)

- 4169 Pardo, F., Betancourth, E., Grueso, R.** Colombia, Ministerio de Salud Publica y Asistencia Social, Instituto Colombiano de Bienestar Familiar. *Problema nutricional y alimentario de Colombia.* (Food and nutrition problems in Colombia). Bogota, Ministerio de Salud Publica y Asistencia Social, Instituto Colombiano de Bienestar Familiar, Subdireccion de Nutricion, Division de Investigaciones Nutricionales, 1974. 1v.(various pagings). Span. 22 refs.

Malnutrition is one of the principal public health problems in Colombia. It affects the population directly, as reflected in indices of food consumption, morbidity and mortality, and anthropomorphic measurements, and indirectly, as reflected in infant and child mortality and their importance in global mortality and the death rate due to measles and intestinal infections. This document briefly discusses each of these direct and indirect indicators of nutrition status and the factors that are responsible for nutrition problems: food availability, food preference, and food utilization. Eight graphs and 19 tables of statistical information are included. (HC-L)

- 4170 Parker, R.L., Shah, S.M., Alexander, C.A., Neumann, A.** *Self-care and the use of home treatment in rural areas of India and Nepal.* n.p., n.d. 30p. Engl. 15 refs.
Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978.
Unpublished document.

Self-care, widely practiced throughout the world, has rarely been systematically documented. This paper reports findings about self-care practices identified during four studies carried out over a 10-year period involving about 14 000 interviews in 7 400 households comprising

over 48 000 people in three Indian states and three districts of Nepal. Differences in the use of self-care by region, age, sex, caste, access to health services, type of illness, and duration and severity of illness are reported. The type of treatment, the persons providing the care, and the expenditures for medicines or ingredients were determined in some of the surveys. Statistical data are included. (DP-E)

- 4171 Partono, F., Oemijati, S., Hudojo, Joesoef, A., Sajidiman, H., Putrali, J., Clarke, M.D., Carney, W.P., Cross, J.H.** *Malayan filariasis in central Sulawesi (Celebes), Indonesia.* Southeast Asian Journal of Tropical Medicine and Public Health (Bangkok), 8(4), Dec 1977, 452-458. Engl. 9 refs.

Seven villages in central Sulawesi, Indonesia, were surveyed in September 1971 and finger blood samples from 3 658 persons examined for microfilariae. Periodic, nocturnal *Brugia malayi* was endemic in all seven villages with microfilarial rates of 10%-42% (mean 25%) and median microfilarial densities of 0.8-9.4 microfilariae: blood sample. Males had higher rates and densities than females and, in males only, these values increased with age. Clinical signs of filariasis were found in 12% of the people examined, the signs showing good correlations with rates but not with densities. Statistical data are included. (DP-E)

- 4172 Partono, P., Djakaria, Oemijati, S., Joesoef, A., Clarke, M.D., Cole, W.C., Lien, J.C., Cross, J.H.** *Filariasis in West Kalimantan (Borneo), Indonesia.* Southeast Asian Journal of Tropical Medicine and Public Health (Bangkok), 8(4), Dec 1977, 459-463. Engl.

In a 1972 survey carried out in eight Indonesian villages to determine the prevalence of filariasis, over 3 000 people supplied finger tip blood smears for examination. Only 108 (3.5%) of the sample population were found to have *Brugia malayi* and 96 of these lived in one village; *Wuchereria bancrofti* was found in 10 people (0.3%). This was the 1st report of rural bancroftian filariasis in the area. A few *Mansonia* species of mosquitoes were examined but none were infected with filarial larvae. Statistical data are included. (DP-E)

- 4173 Parveen, L., Chowdhury, A.Q., Chowdhury, Z.** *Injectable contraception (medroxyprogesterone acetate) in rural Bangladesh.* Lancet (London), 5 Nov 1977, 946-948. Engl. 14 refs.

From June 1974-May 1977, a rural health centre in Bangladesh conducted a family planning programme using an injectable contraceptive administered every 80-90 days. In May 1977, a survey of 1 601 women using this method revealed a superior continuation rate (56% after 1 year), although at least half experienced troublesome side effects and there were indications that milk yield was adversely affected in 147 of the 1 020 women who received their 1st injection while lactating. There was one pregnancy due to method failure. The authors recommend this method of contraception as long as there is careful supervision and follow-up. (RMB)

- 4174 Payne, D., Grab, B., Fontaine, R.E., Hempel, J.H.** *Impact of control measures on malaria transmission and general mortality.* Bulletin of the World Health Organization (Geneva), 54(4), 1976, 369-377. Engl. 8 refs.

Also published in French and Russian.

From 1972-1976, a WHO team conducted a controlled research project in an endemic area of Kenya to assess the impact of malaria control by residual indoor spraying of a pesticide on disease transmission and subsequent trends in crude and infant mortality in a population of 17 000. The researchers' methods are described. Results showed decreases in the daily inoculation rate (0.00037 in the project area, 0.00958 in the control area), the general parasite rate (20% versus 60%), and the infant parasite rate (1.8% versus 35.6%). After 2 years of malaria control, the annual crude death rate fell from 23.9-13.5:1 000 and infant mortality dropped 40.8%. Statistical data are included. (RMB)

- 4175 Peking Children's Hospital, Peking.** *Treatment of acute appendicitis in children with combined traditional Chinese and Western medicine.* Chinese Medical Journal (Peking), 3(6), Nov 1977, 373-378. Engl.

Indications for combined traditional Chinese and Western medical treatment of acute appendicitis in children are considered on the basis of a clinical and pathological study of more than 8 000 cases. A review of 650 cases in two Chinese children's hospitals verifies the effectiveness of the treatment. Of these cases, 37.6% were successfully treated without operation, the fatality rate was 0.15%, and the recurrence rate was 1%. Adoption of combined methods has aided diagnosis and therapy. (DP-E)

- 4176 Prior, P., Seward, P.N., Staackman, F., Galich, L.F., Burski, M., Morris, L.** *IUD use effectiveness in an urban Guatemalan clinic.* Bulletin of the Pan American Health Organization (Washington, D.C.), 11(2), 1977, 117-124. Engl.

Also published in Spanish in *Boletín de la Oficina Sanitaria Panamericana* (Washington, D.C.), 83(3), 1977.

Since long-term use of a contraceptive method is an important indicator of its effectiveness, this survey presents data on IUD continuation rates for 366 women in Guatemala City. The cumulative continuation rate at the end of the 1st year was 72.1% and 56% at the end of 2 years. The median length of IUD use was 27 months. Removal was mainly due to medical reasons or expulsion. Continuation rates were highest among women with five or more previous pregnancies and among those who were trying to avoid pregnancies rather than space them. Few studies of this nature have been carried out in Latin America, but the results compare favourably with those of similar studies made in the USA, Taiwan, and Costa Rica. (FM)

- 4177 Qureshi, S., Devi, K.K.** *Influence of obstetric services on perinatal health; a community study in Hyderabad.* Indian Journal of Pediatrics (Calcutta, India), 44(351), Apr 1977, 106-109. Engl.

Studies were undertaken in a rural field practice area, Hyderabad, India, to determine the effect of improved maternal and child health (MCH) services, particularly the training of traditional birth attendants (*dais*), on perinatal mortality and the effect of supplementing the diet of pregnant women on the birth weights of their babies. Before and after surveys revealed an increase (from 2%-52% of the total) in the number of deliveries being conducted by trained *dais* and a decline in perinatal mortality from 89-48:1 000 live births. Supplementing the diet of an experimental group of pregnant women resulted in a mean birth weight of 3.32 kg as compared to 2.51 kg in the control group. (HC-L)

- 4178 Raghupathy, P., Date, A., Shastri, J.C., Sudarshanam, A., Jadhav, M.** *Haemolytic-uraemic syndrome complicating shigella dysentery in south Indian children.* British Medical Journal (London), 10 Jan 1978, 1518-1521. Engl. 22 refs.

Shigella dysentery caused 65% of all cases of acute renal failure (ARF) in children treated at the Christian Medical College Hospital, Vellore, India, from January 1975-September 1977. In the 40 children with ARF secondary to shigella dysentery, haematological findings suggested that they were suffering from the haemolytic-uraemic syndrome. Peritoneal dialysis was the main element of treatment; 43% of children who underwent dialysis improved, compared with only 25% of those who did not undergo dialysis. The haemolytic-uraemic syndrome precipitated by bacillary dysentery is therefore the most important cause of ARF in children aged less than 5 years in Tamil Nadu and the adjoining area of Andhra Pradesh. (Modified journal abstract.)

- 4179 Ram, E.R., Datta, B.K.** *Study on the utilization of primary health centre and sub-centre health services by the rural people of Miraj Taluka, Maharashtra.* Indian Journal of Public Health (Calcutta, India), 20(3), Jul-Sep 1977, 134-143. Engl.

Primary health centres were first established in rural India in 1946. In 1973, a survey of 10% of the households in Miraj Taluka was conducted to determine how these facilities were being utilized. The district surveyed had 3 centres, each staffed by 2 medical officers, 2 nurse-midwives, and 2 auxiliary nurse-midwives, and 11 subcentres, each staffed by an auxiliary nurse-midwife. It was learned that the centres were used mainly by residents of the towns in which they were located, but the subcentres were more widely used. Attendance at the centres was also influenced by religion, caste, education, and household income of the respondents. Statistical data are included. (DP-E)

- 4180 Rassi, E., Monzon, H., Castillo, M., Hernandez, I., Ramirez Perez, J., Convit, J.** *Discovery of a new onchocerciasis focus in Venezuela.* Bulletin of the Pan American Health Organization

(Washington, D.C.), 11(1), 1977, 41-64. Engl. 22 refs.

A survey was conducted in the Parima mountains and Upper Orinoco River areas of Venezuela to determine the prevalence and intensity of onchocerciasis and its carriers among the Yanomama Indians. The method employed and the results obtained are reported at some length. The investigators concluded that there is no epidemiologic relationship between this focus of onchocerciasis and the traditional Venezuelan foci of the disease. The detrimental effect of the presence of the disease on new settlement in the area is considered. Statistical data are included. (DP-E)

- 4181** Ree, G.H. *Anaemia in a Maldivian (Adduan) population*. Journal of Tropical Medicine and Hygiene (London), 80(10), Oct 1977, 224-226. Engl.

See also entry 4182.

In 1976, a sample of 427 Maldivian Islands inhabitants (207 males and 220 females) in 57 households were examined for evidence of anaemia, malaria, and intestinal parasites as part of a study to provide baseline data for future health surveys. The sanitary facilities and garden produce of the sample households were also assessed. According to the data, 104 persons, or 29% of the sample (39.4% males, 22.3% females), were anaemic; no malaria parasites were discovered and only 25 individuals had malaria antibodies in the blood; 54 of the 57 households had at least one well, but none had a latrine; and benign *Trichuris trichiura* was the most common intestinal parasite. Although unrelated to either standard of housing, garden produce, or chronic infection, the incidence of anaemia may have been due to malabsorption of iron resulting from a lack of ascorbic acid in the diet and aggravated by *Trichuris trichiura*. The relatively low prevalence of anaemia in women of reproductive years is attributed to the effects of good antenatal care. (HC-L)

- 4182** Ree, G.H., Ahmed, M. *Nutritional status of Maldivian (Adduan) children*. Journal of Tropical Medicine and Hygiene (London), 80(10), Oct 1977, 227-228. Engl.

See also entry 4181.

In order to establish a nutritional baseline for measuring changes in the native Maldivian Islands diet resulting from the withdrawal of a British air force station, 63 children aged 1-4 years from 57 poor or underprivileged households were examined for signs of malnutrition and anaemia. In addition, mean annual death rates for this age group were calculated. The children in the sample showed no clinical signs of malnutrition, although 8% appeared malnourished by Harvard weight-for-height ratios. Seventeen (27%) were anaemic and the average annual death rate was 8.3:1 000. These findings attest to the adequacy of the present diet; however, its quality may decline with the reduction in cash resources. It is therefore recommended that the population be reexamined for evidence of malnutrition in the near future. (HC-L)

- 4183** *Revista de la Escuela Nacional de Salud Publica, Medellin, Colombia. Programa piloto de control de rabia en el distrito especial de Bogota. (Pilot project for rabies control in the special district of Bogota)*. Revista de la Escuela Nacional de Salud Publica (Medellin, Colombia), 2(1), Jan-Jun 1975, 87-89. Span.

Following detailed study, a rabies control project in the Bogota district, Colombia, was undertaken. The project comprised an intensive, 90-day campaign aimed at vaccinating the entire canine population, concurrent education of health workers and the public regarding rabies, and a vigorous maintenance phase aimed at vaccinating succeeding generations of dogs through the efforts of the local health centres. By the end of the 90-day campaign, 94% of the district's 250 000 dogs had been vaccinated; this paper describes the means by which this satisfactory level of coverage was achieved. (HC-L)

- 4184** Rico, O., Sierra, L., Perez E., L.M., Pereira, C., Martel de R., D., Villarreal A., G., Turigo C., A. *Salud y participacion de la comunidad. (Health and community participation)*. Revista de la Escuela Nacional de Salud Publica (Medellin, Colombia), 3(1), Jan-Jun 1977, 9-41. Span. 10 refs.

In February 1975, a model of integrated health services was introduced in two pilot centres in the region of Antioquia, Colombia. One year later, a study was undertaken to determine community knowledge of, attitudes toward, and participation in the centres' activities. The study also sought to obtain data concerning the communities' health status, participation in organizations (unions, religious organizations, health committees, etc.), and perception of health problems and their role in solving them. This document presents, in detail, the study objectives, methodology, findings, conclusions, and recommendations. Sixteen tables of data are included. (HC-L)

- 4185** Rochels Marin, P., Castillo La Barces, R., Penaloza Hernandez, A., Ospina de Arboleda, G., Torres de Galvis, Y. *Estudio epidemiologico sobre la malaria en la ciudad de Medellin. (Epidemiological study of malaria in the city of Medellin)*. Revista de la Escuela Nacional de Salud Publica (Medellin, Colombia), 3(1), Jan-Jun 1977, 48-70. Span. 28 refs.

Increases in the incidence of malaria in the city of Medellin and the Department of Antioquia, Colombia, prompted an enquiry into malaria behaviour in these areas. The enquiry comprised a bibliographic review, a retrospective study of all cases reported from 1970-July 1976, a prospective study of all cases reported from 1 August-31 October 1976, and an entomological study in Medellin. Study results indicated that, due to the lack of a vector, a complete chain of transmission did not exist in Medellin; such a chain did, however, exist in Antioquia, where it was aggravated by poor socioeconomic conditions and faulty application of control measures. Study results are set forward in 18 tables and 8 graphs and a number of recommendations for strengthening malaria control in the area are made. (HC-L)

- 4186 Rojas S., L., Borgono D., J.M., Heras, E., Ferrer, X., Valero, X., Miranda, L., Lincoqueo, T.** *Use of the bifurcated needle for BCG vaccination of newborns.* Bulletin of the Pan American Health Organization (Washington, D.C.), 11(2), 1977, 125-130. Engl. 11 refs.

Also published in Spanish in *Boletín de la Oficina Sanitaria Panamericana* (Washington, D.C.), 83(2), 1977.

Two consecutive studies carried out in Santiago, Chile, tested the effectiveness of the bifurcated needle for BCG vaccination of newborns, who should receive half the normal dose to avoid complications. In the 1st study, 895 infants were vaccinated with either the bifurcated needle or the intradermal technique and the results compared. Although the amount of vaccine administered via bifurcated needle was more consistent, it was only 10% of the standard dose and therefore insufficient. An attempt to compensate for this was made in the 2nd study by increasing the vaccine concentration and the number of needle punctures, but the method was still a failure. Nevertheless, the functional advantages of the bifurcated needle method over the intradermal technique indicate that further research should be carried out to improve its effectiveness. (FM)

- 4187 Schreurs, W.H., Migasena, S., Migasena, P.** *Beneficial effect of a high protein-calorie diet on a malnourished patient during hospitalization.* Southeast Asian Journal of Tropical Medicine and Public Health (Bangkok), 8(4), Dec 1977, 498-502. Engl. 16 refs.

A 45-year-old Thai woman suffering from severe malnutrition was put on a high calorie-protein diet without any vitamin supplementation. Several clinical chemical parameters in blood, red cells, and urine for the assessment of nutritional status were investigated at the time of admission to the hospital and after 2 and 4 weeks hospitalization. After 4 weeks, the clinical signs of malnutrition had disappeared and the biochemical functions had returned to normal. Statistical data are included. (DP-E)

- 4188 Sehgal, S.C., Vinayak, V.K., Gupta, U.** *Evaluation of Kato thick smear technique for the detection of helminth ova in faeces.* Indian Journal of Medical Research (New Delhi), 65(4), Apr 1977, 509-512. Engl.

Kato thick smear technique was evaluated on 100 stool samples from patients who were suspected to have had helminth infections. This technique was found to be superior to the direct smear examination, formal ether concentration, and nigrosine-methylene blue methods. Apart from its other advantages, in view of its simplicity Kato's method is recommended for epidemiological surveys of intestinal helminth infections. Statistical data are included. (Modified journal abstract.)

- 4189 Sorlie, P., Schloesser, P., Curtis, E.C., Serwadda, D., Dennis, R.** *Maternal and child health services in Wakiso, Uganda.* East African Medical Journal (Nairobi), 54(5), May 1977, 250-257. Engl. 12 refs.

A survey of three areas, each with about 200 households, was conducted by interviewers using two questionnaires to determine the utilization of maternal and child health services provided by the Wakiso Health Centre, near Kampala, Uganda. The results revealed that utilization rates were high except for one area, which was somewhat remote and had poor roads. There was a general lack of interest in immunization and a high interest in family planning, especially in the area closest to the health centre. Statistical data are included. The questionnaires used are contained in an appendix. (DP-E)

- 4190 Sung, K.T.** *Integrating nutritional and family planning education with food services in Korean day care centers; an evaluation.* Public Health Reports (Rockville, Md.), 93(2), Mar-Apr 1978, 177-185. Engl.

In 1973, a programme that combined the feeding of pre-school children with nutrition and family planning education for their mothers was introduced in some 300 day care centres in the Republic of Korea. In 1975, a survey involving 30 participating and 15 non-participating centres revealed that children from participating centres were heavier and healthier than children from non-participating centres and that their mothers evidenced better nutrition and family planning knowledge and practices. It is suggested that difficulties experienced by the mothers in obtaining the recommended food supplies and family planning services be overcome by orienting nutrition education toward inexpensive and nutritious locally-available foodstuffs and by holding mobile family planning clinics at the centres. (HC-L)

- 4191 Teesdale, C.H., Amin, M.A.** *Simple thick-smear technique for the diagnosis of Schistosoma mansoni infection.* Bulletin of the World Health Organization (Geneva), 54(6), 1976, 703-705. Engl.

Also published in French and Spanish.

A modification of the Kato and Muir thick-smear method of stool examination used in diagnosing helminthic diseases is described. The modification substitutes thick glass coverslips for cellulose acetate film. In comparative tests, the coverslip method revealed more helminth eggs, since pressure can be applied more evenly to the sample. Its disadvantage is that the slides cannot be stored. However, drying out can be temporarily arrested by placing slides in a humidity chamber or by placing a drop of 50% glycerine in water on each. This method, now used routinely in stool examinations in the laboratory and in the field, is simple and quick and can detect all human helminth eggs. (FM)

- 4192 Thacker, S.B., Greene, S.B., Salber, E.J.** *Hospitalizations in a southern rural community; an application of the "ecology model."* International

Journal of Epidemiology (Oxford, UK), 6(1), Mar 1977, 55-63. Engl. 11 refs.

The authors tested the concepts of health services utilization presented in the 1961 White-Williams-Greenberg study, *The Ecology of Medical Care*, using longitudinal data from a 1973-1975 household survey in a rural community in North Carolina (USA). They conclude that the model does predict the utilization behaviour of a rural population and discuss the implications for medical students, who need more training in community medicine, and health planners. The ecology model is explained in detail and the results of the authors' survey are presented as statistical data. (DP-E)

4193 Thibaudeau, M.F. *Evaluation de la famille en sante communautaire; l'adaptation française de l'échelle de Freeman. (Evaluation of the family in community health; the French version of the Freeman scale).* Montreal, Que., Université de Montreal, Faculté des Sciences Infirmières, 23 May 1978. 12p. Fren. 8 refs.

Sixty-ninth Annual Conference of the Canadian Public Health Association and 2nd International Congress of the World Federation of Public Health Associations, Halifax, Canada, 23-26 May 1978.

Unpublished document.

An adaptation of the Richmond/Hopkins Family Coping Index (the Freeman scale) is used in a study of the impact of nursing services on family health among underprivileged families in the Montreal area, Quebec, Canada. On a scale of 1-5, a family's performance and abilities are evaluated in eight areas: knowledge of common diseases and health needs, ability to recognize and treat health problems, knowledge of the principles of hygiene, attitudes to health and health services, behaviour under stress, interpersonal relations within the family, knowledge of environmental health, and knowledge and use of community health resources. (FM)

4194 Universidad del Valle, Division de Salud, Cali, Colombia. Secretaria de Salud Municipal, Cali, Colombia. *Programa de Investigacion en Modelos de Prestacion de Servicios de Salud (PRIMOPS); resumen grafico. (Programme of Research into Models of Health Services Delivery; graphic summary).* Cali, Colombia, Universidad del Valle, Division de Salud, Jun-Dec 1976. 1v.(unpaged). Span.

Unpublished document.

This document presents, in the form of tables and graphs, data collected in the PRIMOPS investigation area, Cali, Colombia, from June-December 1976. The data focus on: childhood malnutrition and its relation to age of weaning, family income, family living conditions, etc.; infant and maternal mortality; family planning acceptance; and various aspects of the health care delivery model under investigation, in particular, the performance of the midwives, auxiliary nurses, and rural health promoters within the system. No discussion of the data is included. (HC-L)

4195 Valverde, V., Rawson, I.G. *Dietetic and anthropometric differences between children from the center and surrounding villages of a rural region of Costa Rica.* Ecology of Food and Nutrition (London), 5(4), 1976, 197-203. Engl. 19 refs.

A nutritional evaluation survey carried out on children aged 6 months-5 years in San Ramon, Costa Rica, revealed marked differences in the nutritional status of children from the central and peripheral areas. Forty-two children from the central area (25% of the total) and 109 from the periphery were randomly selected for a dietary survey and anthropometric data were collected on 119 of the sample. Nutrient intake, weight-for-age, and height-for-age were compared with the standards of INCAP, the Institute of Nutrition for Central America and Panama. Results showed that the diets of the village children provided less energy and nutrients and that 2nd and 3rd degree malnutrition was greater in the peripheral area. (FM)

4196 Varea Teran, M., and Varea Teran, J., ed(s). *Investigaciones Medico-Sociales del Ecuador, Quito. Nutricion y desarrollo en los Andes ecuatorianos. (Nutrition and development in the Equadorian Andes).* Quito, Investigaciones Medico-Sociales del Ecuador, 1974. 428p. Span. Refs.

This series of studies explores and compares the nutritional, socio-anthropological, physiological, psychological, and biomedical characteristics of rural and urban populations in Ecuador. Among other conclusions, the studies reveal: that the rural population suffers from protein-calorie malnutrition; that the rural newborn weighs less at birth than the urban newborn and gains weight at a slower rate during the 1st year of life; that rural schoolchildren lag behind urban schoolchildren with respect to mental ability, weight for height, and skeletal development; that nodular goitre is endemic in rural areas, affecting approximately 79% of the population; etc. Statistical data are included. (HC-L)

4197 Vernon, T.M., Conner, J.S., Shaw, B.S., Lampe, J.M., Doster, M.E. *Evaluation of three techniques for improving immunization levels in elementary schools.* American Journal of Public Health (New York), 66(5), May 1976, 457-460. Engl.

Three techniques for improving immunization levels among school-age children were tested and compared. Method A involved reviewing school immunization records and inviting immunization-deficient children to a school-based clinic, method B sending out permission slips for a school-based clinic to all students, and method C a health education programme encouraging parents to have their children immunized on their own. Method A succeeded best at utilizing school nurses' time, immunizing more immunization-deficient children, and raising immunization levels while giving fewer unnecessary immunizations. Method C did not produce significant improvement of immunization levels. (Modified journal abstract.)

- 4198 Werner, G.T., Sareen, D.K.** *Trachoma in Punjab; a study of the prevalence and of mass treatment.* Tropical and Geographical Medicine (Haarlem, Netherlands), 29(2), Jun 1977, 135-140. Engl. 18 refs.

A 1971-1974 investigation in the Indian state of Punjab revealed a 71.07% prevalence of trachoma in the general population. There was a greater incidence of trachoma among children than adults, but complicated cases were more common in people aged more than 45 years. Evidence indicated that trachoma may develop from bacterial conjunctivitis caused by dust blown into the Punjab seasonally by the Arabian winds. Trachoma can be eradicated by the use of tetracyclines, but it is cheaper and more practical to use sulfa drugs for mass treatment. Heightened public awareness is necessary to control the disease. Statistical data are included. (DP-E)

- 4199 WHO, Geneva.** *Human plague in 1976/la peste humaine en 1976.* Weekly Epidemiological Record (Geneva), 52(28), 15 Jul 1977, 229-231. Engl., Fren.

This article gives statistics on the incidence of human plague throughout the world in 1976 on a continental basis and compares this data with the information for 1975. Possible causes of the disease such as rodent

plague and infections from sylvan foci are discussed briefly. Statistical data are included. (DP-E)

- 4200 Yamamoto, M.** *Health by the people; how important are the decision-makers?* International Journal of Health Education (Geneva), 20(4), Oct-Dec 1977, 279-281. Engl.

A 1961 rural Japanese community health programme to eradicate encephalitis and reduce perinatal mortality was based on mosquito control and a vigorous maternal and child health service supported by a mothers' group that carried out self-help activities under the guidance of community nurses. Both aspects of the programme received the constant and enthusiastic support of the community's mayor. After 5 years, the mosquitoes were almost totally eradicated, the incidence of encephalitis had dropped from 18%-0, and the perinatal mortality rate had fallen from 73.3-45.7:1 000 live births. At that time, a newly-elected mayor decided to withdraw support from the programme. The mosquito control efforts immediately foundered for lack of funds, but the maternal and child health service continued through the mothers' own efforts, contributing to further reductions in perinatal mortality. It is concluded that, while the support of the leadership of a community is essential to the adoption of a programme, a programme that corresponds to a felt need and whose educational element has been sufficiently well-directed may continue even in the absence of official support. (HC-L)

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