Health care providers have observed a high incidence of cervical cancer in many developing countries in Africa, Asia, and Central and South America, and in the absence of organized early-detection programmes the mortality rates from this disease remain high. The extremely limited health-care infrastructure available in many of these countries contributes to a compelling need to build a capacity to identify cervical neoplasia in early, preventable stages, preferably even before - and not in the wake of - the introduction of early detection programmes in such settings. Colposcopy is generally regarded as a diagnostic test; it is used to assess women who have been identified to have cervical abnormalities on various screening tests.

This introductory manual for gynaecologists, pathologists, general practitioners, and nurses is intended to provide information on the principles of colposcopy and the basic skills needed to colposcopically assess cervical intraepithelial neoplasia and to provide basic treatment. Interested health professionals are expected to subsequently continue to improve their skills by undertaking a basic course of theoretical and practical training, and by referring to standard textbooks dealing with the subject more extensively. Continuing practical work is vital for acquiring, improving and sustaining necessary skills in the colposcopic diagnosis of cervical neoplasia. This manual is also intended to be a beginner’s self-learning resource and as a teaching aid for colposcopy courses for health care personnel, as well as a resource for teaching curricula for medical and nursing students in developing countries. It may also be used as a field manual in routine screening programmes.

A good understanding of the gross and microscopic anatomy of the uterine cervix, infective and inflammatory conditions of the cervix and the vagina, histology and the natural history of cervical neoplasia is absolutely essential for a correct interpretation of colposcopic findings and colposcopic diagnosis of cervical neoplasia. These aspects are dealt with in detail in this manual, and should be well studied in conjunction with other chapters dealing with colposcopic techniques and features of cervical neoplasia and their treatment.

Generally speaking, colposcopy should not be practised unless the provider has had an opportunity to spend some time with an experienced colposcopist. Unfortunately, this is extremely difficult to arrange in most of the developing world, where the disease incidence is high (particularly in sub-Saharan Africa) and both access to such training and to a colposcope is rarely available. For instance, quite apart from colposcopy training, no colposcopy service itself is available in whole regions of Africa and Asia and Latin America. Realistically, the basic colposcopist in such situations is a self-trained health-care provider who knows how to examine the cervix, what to look for, how to make a diagnosis, and how to treat a woman with simple ablative or excisional methods. We emphasize, however, that an instructor should be available for the on-site training of new colposcopists. The limitations and far-reaching implications of incomplete understanding of cervical disease and inadequate expertise should be well appreciated by potential practitioners.

Draft versions of this manual have been used in more than 20 courses on colposcopy and management of cervical precancers conducted in Angola, Congo (Brazzaville), Guinea, Kenya, India, Mali, Mauritania, Laos and Tanzania. More than 120 doctors and nurses have been trained and initiated in colposcopy in the context of the cervical cancer prevention research initiatives in these countries as well as in other countries such as Burkina Faso, Cape Verde, Equatorial Guinea, Mozambique, Nepal, Niger, Sao Tome and Uganda. Feedback from the participants and teaching faculty of these courses has been particularly useful in revising the draft versions of the manual. The illustrations used in this manual have also largely been drawn from the above-mentioned country projects.
The resource constraints for health-care systems in many developing countries are substantial, with practical challenges on how colposcopy and treatment of early cervical neoplasia can be integrated into and delivered through these health services. Awareness of these limitations will pave the way to establishing, integrating, and maintaining such services within the health-care infrastructure of developing countries. We hope that this manual will help the learner, given access to a colposcope, to start performing colposcopy and recognizing lesions, and in effectively treating them with cryotherapy or loop electrosurgical excision procedure (LEEP). We believe that, in due course, it will catalyse and contribute to the initiation and dissemination of preventive services for cervical cancer in low-resource regions and countries.

John W. Sellors M.D.
R. Sankaranarayanan M.D.