

# Development of dermatological services in Cambodia

*After almost two decades of vigorous support of health services, health indicators in Cambodia remain among the worst in Asia.*

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2014 marks the 20th anniversary of the end of the so-called UNTAC (United Nations Transitory Authority in Cambodia) mission. Apart from consolidating Cambodia's full sovereignty after more than a decade of Vietnamese occupation, UNTAC supervised comparatively free and fair elections that subsequently triggered a massive influx of foreign development aid in all fields. Healthcare also benefited from this financial and technical support, extending from grassroots organisations to big bilateral donors.

However, after almost two decades of vigorous support of health services, health indicators in Cambodia remain among the worst in Asia. Despite improvements in all fields, adults and children continue to suffer from under- and malnourishment, infectious diseases such as malaria, tuberculosis and dengue fever, and diarrhoeal illnesses due to unhygienic conditions. Access to clean drinking water, particularly in rural areas,

is often poor. Household expenditure on private and government health services and loss of income due to disease and disability contribute to poverty. About one-third of people who purchase medicines do so from pharmacies, where staff are usually underqualified, without any medical consultation. Just over 10% do not seek any help at all when they are sick.

## Competent dermatohistopathology was (and is still) not available.

Even in cases of less serious disease, medical expenses can lead to loss of land and cattle, leading to further impoverishment. Financial hardship results in insufficient nutrition, which increases the risk of further ailments. The widespread poor health resulting from this vicious cycle limits the economic and intellectual development of large segments of the population.

The flourishing private medical and dental clinics run by Cambodian or foreign stakeholders give a surface impression that services are widely available, but most of these establishments are financially off limits for the vast majority of the population.

### Background

During the regime of the Khmer Rouge (1975 - 1979), healthcare in Cambodia collapsed almost entirely. Nearly all the country's hospitals were destroyed, all private practices were closed down, and the Faculty of Medicine of the University of Health Sciences (UHS) in the capital city of Phnom Penh was forced to shut down and was not replaced. Homicide, untreated disease, starvation and death due to overwork resulted in only 50 of the 1 000 or so physicians of the old regime surviving Pol

Pot's 40-month reign of terror. In January 1979, Vietnamese forces, tired of ongoing border violations, drove the Khmer Rouge out of Cambodia and established themselves as liberator-occupiers, eventually staying 11 years. During this time medical services were re-established in a rather sketchy and basic manner, partly with the help of socialist brother countries such as the former Soviet Union and the former German Democratic Republic. The UHS in Phnom Penh also resumed work, under extremely reduced conditions.

### Review and re-structuring

After UNTAC, the Cambodian authorities launched a general review and re-structuring of the health sector, supported by technical and financial help from foreign donors and international organisations. German lecturers in dermatology/venereology were dispatched to the UHS in order to strengthen services in the field.

The UHS provides academic training for both undergraduate students in the health sciences and postgraduate physicians, dentists and pharmacists. Improvement in the quality of training is an ongoing challenge, as the majority of graduates (and some of the lecturers) are seriously under-qualified. The current and future emergence of private universities and the challenge from highly regarded universities in ASEAN member states such as Thailand and Singapore may marginalise government institutions like the UHS. With regard to postgraduate training, so far most specialists have gained their qualifications abroad. Some specialties are non-existent. In recent years, the UHS has attempted to correct this deficit and, usually with technical and financial aid from foreign donors, now offers medical specialisations and university diplomas in some fields.

### Dermatology

Dermatology/venereology is among the areas where there is a clear need for

## Dermatological services in Cambodia



*Christoph Bendick and interpreter talking to patient.*



*Neglected ulcerated basal cell carcinoma.*



*Diploma course students.*



*Patients waiting for treatment.*



*Department of Dermatology at Preah Kossamak Hospital, Phnom Penh.*



*Professor Mey Sithach with Dr Vinzenz Oji (University of Münster, Germany) and undergraduate students.*

improvement. In the early 2000s, only one board-certified dermatologist and a handful of graduates of a 10-month diploma course at the Institute of Dermatology in Bangkok were confronted with the task of caring for 11 million Cambodians (in comparison, Germany has one dermatologist per 25 000 inhabitants). All the physicians were working in Phnom Penh, so the rest of the country, and therefore 80% of the population, was practically without

qualified dermatological care. Competent dermato-histopathology was (and still is) not available.

However, the need for specialised care is high. As several studies in developing countries have demonstrated, about 30% of all patients who consult a general physician complain about symptoms that fall into the field of dermatology/venereology: diseases of the skin, mucous membranes, dermal

appendages, superficial veins, anus and rectum, as well as disturbances of male fertility. Many years of personal clinical experience corroborate the high incidence of dermatological morbidity in Cambodia and the need to improve specific care.

### The Diploma Course in Dermatology

In 2005, under the supervision of the UHS and with German and French support,



Scars (moxibustion).



Eczematized tinea pedum.

a Diploma Course in Dermatology was established. Each course has 10 participants and includes the following 2-week modules:

- Basics of dermatology
- Dermatoses caused by bacteria
- Dermatoses caused by fungi, viruses and parasites
- Diseases of allergic origin
- Inflammatory diseases of the skin

- Constitutional diseases of the skin and photo-dermatoses
- Skin tumours
- Sexually transmitted diseases
- Skin diseases according to location
- Skin diseases according to age.

During course modules, students are required to complete 320 hours of internship in hospitals and laboratories in Phnom Penh. The course is designed to teach basic principles of diagnostics and therapy and is intended to qualify participants to recognise and treat the majority of dermatoses prevalent in Cambodia. They should also get a feeling for clinical presentations beyond their capabilities and consequently send such cases to the Department of Dermatology at Preah Kossamak Hospital in Phnom Penh (see below).

In order not to alienate participants from their home hospitals, they do not stay in Phnom Penh for the entire duration of the course, but return to their provinces and their hospitals between modules. After graduation, they are able to apply for 3 - 6-month internships in Nancy (France) or Mannheim, Münster and Hamburg (Germany).

The diploma course is taught mainly by French, Swiss and German lecturers, along with a few Cambodians. All

foreign lecturers are self-funded. Because an entirely foreign-financed course is unsustainable, and full specialisation in dermatology became available early in 2013, the Dermatology Diploma will be concluded at the end of the fifth course, which is currently being held.

### Full specialisation

At the request of the UHS and the Ministries of Health (MoH) and Education, full specialisation in dermatology according to international standards has been prepared over the past few years and was implemented at the beginning of 2013. Like comparable specialisations in Cambodia, internships have the following structure:

- One year of training in internal medicine, paediatrics, and surgery to reinforce knowledge acquired at university and to prepare for dermatology training as an interdisciplinary subject.
- Two years of dermatological training in Cambodia, divided into 8 months in the Department of Dermatology at Preah Kossamak Hospital, 8 months in the clinic of the National Centre for HIV, AIDS, Dermatology and STDs, and 8 months in the Leprosy Rehabilitation Centre Khien Khleang
- One to two years of dermatological training in the departments of dermatology at the university hospitals of Nancy and/or Bordeaux (France).

Every year, two graduates from the UHS are chosen to start their specialisation in dermatology according to the results of a selection process.

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### Establishment of the Department of Dermatology at Preah Kossamak Hospital

In 2008, with the help of mostly German institutions, a modern dermatology department was established at Preah Kossamak Hospital, one of the major public hospitals in Phnom Penh, for the purposes of patient care. It also serves as a centre for under- and postgraduate training and, to a modest degree, research. The department is headed by Professor Mey Sithach, so far the only fully qualified, German-trained Cambodian dermatologist. Facilities include out- and inpatient care, an operating theatre, proctoscopy, dermatoscopy, and teaching and training rooms. A well-stocked library and Internet access are available to all, including students. Teledermatology and telepathology make up some of the ever-increasing online facilities.

Outside Phnom Penh, a fair number of diploma course graduates have established dermatological departments and private practices. These departments are usually in provincial referral hospitals, which co-operate with the local branches of the National Leprosy Programme and the National Programme of STIs and HIV/AIDS. It is planned to gradually increase the number of these facilities and improve their quality by supporting staff in terms of continuous education, logistics and financing.

### Quality management

With some difficulty, the relevant authorities in the Cambodian MoH were able to

be convinced of the need of quality management (QM) in dermatology/venereology. This includes the gradual conception and realisation of:

- Definition and implementation of quality standards in hospitals and private practices
- Development of diagnostic and therapeutic standards
- Standardisation and thus dependability of dermatological training
- Accreditation and certification of physicians working in the field of dermatology/venereology.

Realisation of these goals requires broad consensus among all parties involved and close co-operation between the MoH, hospital directors, physicians and consultants. Although first initiatives in the field have been realised, there is still a long way to go until QM in dermatology becomes daily practice.

### Health insurance

Government institutions as well as a number of international organisations are involved in the development of various health insurance schemes for selected sectors of the Cambodian population, in particular poor households. Vigorous efforts have ensured the inclusion of skin diseases in these plans, thus guaranteeing that treatment by physicians qualified in dermatology/venereology will be covered by health insurance. However, many physicians, public health experts and health insurers tend to view skin diseases as of minor importance, so a lot of persuading still has to be done.

### Funding and support

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