PHASE 2 REPORT

Study of financial access to health services for the poor in Cambodia

Phase 2:
In-depth analysis of selected case studies

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Ministry of Health, WHO, AusAID and RMIT University

30 June 2007
Phnom Penh

This is the Draft Final Report for Phase 2 of the Study of Access to Health Services for the Poor in Cambodia supported by AusAID, WHO Cambodia, RMIT University (Melbourne) and the Ministry of Health Cambodia. The Final Report fulfills the requirements of Milestone 6 under AusAID Contract 13732, Variation Order No. 2 of 31 July 2006, Clause 6.1 (i).

Funding for the research was agreed under the terms of the Contract (CON 13732) signed in 2005 between AusAID and RMIT University for implementation of the study project under the title *The cost, benefit and sustainability of equity funding for health: evidence from Cambodia*. Terms for Phase 2 of the study were formalized by the Contract Variation to the Scope of Services finalized in July 2006.

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Glossary

ADB	Asian Development Bank
AFH	Action for Health
AMDA	Asian Medical Doctors Association
AusAID	Australian Agency for International Development
BHE	Bureau of Health Economics of the DPHI
BFH	Buddhists for Health
BOR	Bed occupancy rate
BTC	Belgian Technical Cooperation
CAAFW	Cambodian Association for Assistance to Families and Widows
CAS	Centre for Advanced Studies, Phnom Penh
CBHI	Community-Based Health Insurance
CDHS	Cambodia Demographic and Health Survey
CEDAC	Centre d'Etude et de Développement Agricole Cambodgien
CFDS	Cambodian Family Development Services
CHHRA	Cambodian Health and Human Rights Alliance
CIDA	Canadian International Development Agency
CMS	Central Medical Supply (MOH)
CON	Contracting
DFID	Department for International Development (UK)
DPHI	Department of Planning and Health Information (MOH)
EF	Equity Fund
EI	Exit interviews
FGD	Focus group discussions
EU	European Union
FMFA	French Ministry of Foreign Affairs
GTZ	German Technical Cooperation
GRET	Groupe de Recherche et d'Echanges Technologiques (SKY manager)
HEF	Health Equity Funding
HC	Health Centre
HCP	Health Coverage Plan
HFC	Health Financing Charter
HIS	Health Information System (MOH)
HNI	Health Net International
HSSP	Health Sector Support Project (funded by the ADB, WB, DFID, JFPR)
HU	Health Unlimited
INGO	International NGO
ID	Identification
IPD	In-patient department
JFPR	Japan Fund for Poverty Reduction
KII	Key informant interviews
LNGO	Local NGO
MH	Municipal Hospital (Phnom Penh)
MHD	Municipal Health Department (Phnom Penh)
MOH	Ministry of Health
MOP	Ministry of Planning
MSF	Médecins Sans Frontières
NGO	Non-government organisation

ODO	OD administrative office
OPD	Out-patient department
OD	Operational District
PHD	Provincial Health Department (MOH)
PH	Provincial Hospital
PPMH	Phnom Penh Municipal Hospital
RH	Referral Hospital
RMIT	Royal Melbourne Institute of Technology (Australia)
SHI	Social Health Insurance
SCA	Save the Children Australia
SKY	Health for Our Families (phonetic for Khmer translation)
SRC	Swiss Red Cross
UHP	Urban Health Project
URC	University Research Company
UNFPA	United Nations Fund for Population
USAID	United States Agency for International Development
USG	Urban Sector Group
VHSG	Village Health Support Group
WB	World Bank
WHO	World Health Organization

Executive summary

Introduction:

The Study of Financial Access to Health Services for the Poor in Cambodia has been carried out in two phases. Phase 1 of the Study (completed in April 2006), made a comprehensive national analysis access to health services for the poor across all health districts in Cambodia where Contracting, Health Equity Funding (HEF) and/or Community-Based Health Insurance (CBHI) schemes had been introduced.

Phase 2 builds on the Phase 1 findings through the analysis of two in-depth case studies in one urban and one rural location – Phnom Penh (the capital city) and Ang Roka (a rural district in Takeo Province two hours drive south-east of the capital). The case study approach was designed to validate the findings of the Phase 1 research and to provide richer and more detailed qualitative data on the operation and impact of the pro-poor schemes, focussing on the demand-side issues of access to health services.

Phase 2 collected data on facility utilization and revenues, the impact of user fees on service users, and the implementation of Contracting, HEF and CBHI schemes. Of the two sites, Phnom Penh had official user fees, HEF and CBHI (through the SKY insurance scheme) while Ang Roka had these three schemes as well as Contracting.

The main interest of the Access Study is the impact of these various schemes – separately and together – on access to public health services for the poor. In practice, user fees are universal and apply to all patients unless they qualify for formal (means-tested and funded) exemptions or informal exemptions (offered by health staff to poor people when required). Contracting covers the management and administration of all public health services in the selected district (such as Ang Roka). HEF is targeted on the poor and is implemented in Phnom Penh and Ang Roka, following an objective means test administered through household surveys; it is available automatically to all those identified through the means test. And SKY is a voluntary community-based health insurance scheme relying on self-selection through the purchase of premiums, and is targeted on the not-so-poor (workers in the formal and informal sectors).

Methodology:

Phase 2 of the Access Study addressed a number of key questions related to these issues:

- Are user-fee systems applied appropriately?
- Do user fees exclude the poor from health services?
- Do exemptions, HEF and CBHI schemes provide increased access to services?
- Is the quality of care the same as for those who pay fees?
- What are the public perceptions of user fees, HEF, CBHI and health services?
- Are there significant rural-urban differences?

The research used a number of different quantitative and qualitative methods of data collection and triangulated the data to establish valid findings. Data collection was carried out following an analysis of the published literature on relevant issues and a documentary analysis of all relevant reports on user fees, Contracting, HEF and CBHI in Cambodia.

The literature review and documentary analysis built on and updated the work carried out in Phase 1 of the Study.

Routine quantitative data on referral hospital utilization and revenues were collected for Phase 2 through the Ministry of Health from the official Health Information System. Routine quantitative data on HEF attendances at facilities and SKY enrolment were collected from the NGO scheme providers.

Primary data was collected through different qualitative methods, which included:

- Structured patient exit interviews at the referral hospitals and all health centres at the two study sites.
- Focus group discussions with HEF beneficiaries, SKY beneficiaries, and non-beneficiaries of any scheme at the two study sites.
- Key-informant interviews with MOH provincial and district health managers and staff and local and international NGO providers of Contracting, HEF and SKY programs at the two study sites.

The study sites were chosen against criteria that included:

- An urban site.
- A rural site.
- A site that includes all schemes (User Fees, Contracting, HEF and CBHI).
- The site had reliable data on utilization, exemptions and revenues for at least the last five years.
- The site had reliable data on the implementation of HEF and/or CBHI arrangements for at least the last two years.

For the qualitative research, the aim was to survey a sufficient number of respondents through key informant interviews, focus group discussions and patient exit interviews to get a complete and accurate view of the situation. Sites for the data collection included the Municipal Health Department (MHD), the Phnom Penh Municipal Hospital and all seven health centres in the Municipality supported by HEF schemes. In Ang Roka, the data collection sites included the Provincial Health Department (PHD), Provincial Hospital, OD district health office, the Referral Hospital and all nine health centres in the district.

In total, qualitative data was collected from the following number of respondents:

- Patient exit interviews: A total of 679 patients from all facilities
- Focus group discussions: A total of 12 focus group discussions involving a total of 166 participants
- Key informant interviews: A total of 42 key informants equally distributed across the two sites.

Ethics approval was granted by the Research Ethics Committee of the Ministry of Health, a plain language ‘Respondent Information Sheet’ was prepared and issued to data collectors, who were trained in its use at Training Workshop sessions, and a ‘Statement of

Informed Consent' was prepared to guide data collectors and to inform respondents about the purposes and methods of the study.

Data collection, data entry and preliminary analysis were carried out with the assistance of staff from the Department of Planning and Health Information (MOH) and the Centre for Advanced Studies (CAS) under the supervision of the Chief Investigator. Data collection was completed in Phnom Penh from 9 to 13 October and in Ang Roka from 20 to 23 November. Workshop training was provided for all data collectors prior to data collection. The data collection team comprised the following staff:

- The Chief Investigator (Peter Annear)
- The WHO health financing advisor (Maryam Bigdeli)
- The director and four staff of the MOH Health Economics Bureau (Ros Chun Eang, Ngin Seilaphiang, Thor Bony, Kim Lunsithan, Phum Phat)
- One research associate (Men Rithy Chean)
- Eleven researchers from the Centre for Advanced Studies
- A research assistant (Phy Sopheada).

Findings:

In general, the evidence suggests that HEF and SKY provided access for many people who did not previously attend public health facilities, some because they could not afford it and for some because they used alternative providers. For more than half of patients attending the facilities at the time of data collection, the hospital or health centre was their first point of treatment.

Among the most important findings of the research were:

- HEF is the only mechanism that provides access to public health services for those people who previously could not attend because they did not have the money to meet the user fees and associated costs.

- SKY-CBHI provided a mechanism to encourage the greater use of public health services by patients who had previously used alternate services, including more expensive state hospitals and private providers.

- Supply-side financing and management mechanisms – such as user fees and Contracting – work best to improve the utilization of public health services when used in combination with demand-side measures such as HEF and CBHI.

- The effectiveness of HEF and CBHI may depend on the context and the conditions of implementation and management.

Together, HEF and SKY provided coverage for about 30% of patients attending the facilities in Phnom Penh and Ang Roka at the time of data collection. The coverage provided by HEF and SKY in each location was influenced by the length of time each had been implemented and to the strength of management in the implementation of the schemes, including the completeness of pre-identification processes for HEF. HEF had been implemented since 1999 in Phnom Penh but only since April 2005 in Ang Roka.

SKY insurance had been available in Phnom Penh only since December 2005 and in Ang Roka from June 2001. In Phnom Penh, HEF was available at the Municipal Hospital and seven health centres; in Ang Roka it was available (formally) only at the Referral Hospital (and informally through health centres). In Phnom Penh SKY insurance was provided through one health centre and the Municipal Hospital and in Ang Roka at all nine health centres and the Referral Hospital.

There was a feeling among respondents that the poor relied increasingly on public services for their health care and could not afford private providers. Utilization of the referral hospitals in both locations had increased steadily in recent years, aided by the contribution of the HEF and SKY schemes. It appeared that HEF had helped to overcome financial barriers facing the poor, and that SKY had encouraged those with a little more money to attend public facilities rather than alternative providers.

The steady growth of IPD and OPD attendances evident at the two referral hospitals has not in general been seen at comparable MOH facilities that do not enjoy external support or have the HEF or SKY schemes. In the first nine months after its introduction in Ang Roka, the HEF provider reported that more than 60% of RH patients were support by HEF. There was also evidence that health centres had performed more strongly in recent years, relieving the burden of OPD attendances at the referral hospitals and strengthening the referral system.

Respondents believed that the provision of Contracting services in Ang Roka OD had had a positive impact on staff incentives and health facility management, ensuring in particular that services were able to operate 24 hours a day. While Contracting was valued, there was also a strong view among local health administrators that it was time to hand over the responsibility for implementing the Contracting arrangements to MOH personnel (in a similar manner to the arrangements at Takeo Provincial Hospital).

User fees – together with HEF and SKY – have become an important source of revenue for facilities on top of government funding for infrastructure costs, staff and drug supplies. Patients considered the fee schedules to be reasonable and fair to most people, though still a barrier to the very poor. At facilities, normal exemptions were offered to the poor but were regarded as a drain on facility revenues. Consequently, the combination of user fees for those who could afford them and funded exemptions, like HEF, was seen as the best alternative to guarantee access for the poor.

The evidence from patients and health administrators suggests that, together, Contracting, HEF and SKY had helped to limit and control the practice of under-the-table charges at public health facilities, and had helped to improve staff behaviour towards patients. The contractual arrangements and performance agreements that accompanied these schemes, as well as the monitoring and supervision, had worked to provide harsh penalties when such practices were discovered. According to patients, however, under-the-table charges had not been eliminated.

In general, community knowledge and understanding of the user fee system, of HEF and of SKY is limited. While health centres (particularly those with external NGO support) conduct outreach activities and community structures (like village chiefs or Village

Health Support Groups) are used to publicise the nature of these schemes, in many cases almost half of the patients interviewed had not been well aware of them.

The provision of HEF and SKY are regarded by patients and be health administrators as fair, with few complaints about false inclusions and exclusions. However, particularly in Ang Roka, it appeared that people who qualified for HEF may not have yet received it. In general, HEF and SKY patients were satisfied with the treatment they had received from the health staff, though there were still complaints about the behaviour of some doctors and nurses. There was no evident stigma associated with HEF beneficiaries, and HEF membership was valued.

The degree to which communities had been involved in the setting of user fees (as is required by health financing regulations), and the degree to which patients had been empowered in their dealings with the health system, were both limited. Health administrators testified that they had in some cases carried out consultations with community leaders or local administrators in setting fees, but real community participation was lacking and patients felt they had not been fully consulted. In Phnom Penh, the HEF implementer (USG) had been more active in working within the communities and provided community liaison workers, but less had been done in this respect in Ang Roka.

Borrowing and asset sales remained common, even among HEF and SKY beneficiaries, but it appears that the schemes may increase the opportunity for discretionary use of money set aside for health care.

Few rural-urban differences were evident, though pre-identification for HEF seemed more effective in Phnom Penh, and in Ang Roka there was much more widespread uptake of SKY, reflecting the longer period of implementation there. Demographically and financially, the urban setting was more divers and more complex than the rural. The level of debts and asset sales in Ang Roka were greater than in Phnom Penh, perhaps reflecting the higher levels of poverty.

Conclusions:

Almost universally in Phnom Penh and in Ang Roka the main benefit derived from the availability of the HEF and SKY schemes was regarded as the reduced costs of treatment and improved access. This was evident from all sources of data.

Among the significant conclusions to be drawn from the Phase 2 study are:

- HEF and CBHI can provide coverage for a significant proportion of the population and protect the poor
- HEF provides access to health services for the poor
- HEF and SKY help to increase the use of public facilities
- HEF and SKY help to reduce the problem of under-the-table charges but do not yet fully empower patients
- HEF and CBHI increase the scope for discretionary use of OOP payments for health care
- HEF is regarded as fair with no feelings of stigma felt by HEF beneficiaries.

- User fees, Contracting, HEF and CBHI work best in combination.

In general, the findings from exit interviews, focus group discussions and key informant interviews were consistent, and indicated that HEF and SKY worked to improve access to health services for the poor and the near-poor. It appears that these health financing schemes, along with Contracting procedures, have acted to improve the behaviour of the health staff towards patients and to make services more responsive to the needs of the poor. HEF, SKY and Contracting all appear to help achieve more accountability on the side of the service providers.

1 Background

The Study of Financial Access to Health Services for the Poor assessed the national health and poverty relationship in Cambodia, with particular reference to financial access to health services by the poor in two locations, one urban and one rural, and evaluated the impact of existing health financing and social protection schemes that act to alleviate the burden of health care costs on the poor. The research considered issues related to four major health financing and pro-poor schemes – User Fees, Contracting, Health Equity Funding (HEF) and Community-Based Health Insurance (CBHI) (see Figure 1 below.).

Phase 1 of the Study of Financial Access to Health Services for the Poor, completed in April 2006, made a comprehensive national analysis of access to health services for the poor across all health districts in Cambodia where Contracting, HEF and/or CBHI schemes had been introduced. The full report of Phase 1 findings is available at www.ausaid.gov.au and at www.who.int. Phase 2 of the Access Study, completed in June and 2007, built on the research completed in Phase 1 through in-depth case studies in two selected health districts to identify the impact of the various financing schemes on access to health services for the poor.

The case study approach is designed to validate and deepen the findings of the Phase 1 research by in-depth analysis of facility utilization and patient attitudes in the selected health districts. Phase 1 looked for common trends in utilization, fee-exemptions and revenues among all health districts with the identified financing schemes. Phase 2 investigated the conditions of access to health services in Phnom Penh Municipality and in the Ang Roka Health Operational District, where these schemes have been in place for some time.

In brief, Phase 1 of the research indicated that: Contracting increases access to health services by strengthening management and quality of service but does not specifically target the poor; HEF specifically targets the poor and increases their access to health services; CBHI targets those living just above the poverty line who may otherwise become impoverished by health costs.

Phase 2 of the research focused principally on demand-side issues in access to health services. Of the four health financing and pro-poor schemes included in the study, User Fees and Contracting are clearly supply-side initiatives designed to improve the management and financing of public health services. HEF and CBHI act on the demand side to remove financial barriers to access to public health services. All four schemes act in different ways to improve the quality of service delivery.

Phase 2 commenced on 1 July 2006 and was completed on 30 June 2007. Data collection was completed by 31 December 2006. Partners in the Phase 2 study included AusAID, WHO Cambodia, Ministry of Health (MOH) Cambodia and the Globalism Institute at RMIT University (Melbourne). The Study Team comprised Dr Peter Annear (RMIT University), Dr Lo Veasna Kiry, Mr Ros Chun Eang, Ms Thor Bony (and staff from the Department of Planning and Health Information, MOH), and Ms Maryam Bigdeli (WHO Health Financing Officer), with support from Mr Men Rithy Chean and researchers from the Centre for Advanced Studies (CAS). Translation and research assistance was provided by Mr Phy Sopheada and Mr Chap Prem.

Figure 1. User Fees, Contracting, Health Equity Funding, and Community-Based Health Insurance

User Fees	Contracting	Health Equity Funding	Community-Based Health Insurance
Official user fees at public health facilities were introduced in Cambodia through the 1996 Health Financing Charter. The Charter certifies the imposition of official fees according to an agreed schedule at affordable rates following consultation with the community. The initiative to implement fees remains with hospitals and health centers. Health facilities must apply to the MOH for permission to implement fees, based on minimum standards of service delivery.	Denotes a scheme in which all government health services at health district level (primary-level care at health centres and secondary-level care at district referral hospitals) are managed and delivered by a non-government operator working under contract to the MOH, using MOH staff with performance agreements, and funded in Cambodia through the ADB/WB Health Sector Support Project (in 11 health districts).	A third-party payer scheme for indigent patients in which a fund is managed at district level by a local agent (usually NGO), supervised by an international NGO, and funded by donors (or in some cases through community collections). The poor are identified at or prior to the point of service and receive free care at the health facility. The facility then receives reimbursement monthly directly from the fund for services provided to the poor. May eventually become tax-funded.	Local-level insurance schemes funded by user premiums and managed commonly by an international or local NGO. The insurer contracts public health facilities to provide approved health services. Patients pay the costs of health care at nominated government facilities and then receive reimbursement from the insurance fund. May eventually be included under the umbrella of the anticipated tax-funded social health insurance scheme.

2 Health financing schemes

The Cambodian public health system is organised into 76 different operational health districts (ODs), each serving a population of roughly 100,000 to 200,000, each with a district referral hospital, and each with 10-20 primary-care health centres.

Under its broader program of health sector reform, the Ministry of Health began a pilot program for the implementation of a system of official User Fee schemes in a number of public health facilities. The 1996 National Health Financing Charter extended the opportunity to approved public health facilities to levy and collect User Fees according to an agreed scale formed in consultation with local communities. The aim was to generate extra revenues at facility level and to create a managed environment for improving service quality. Consequently, 99% of the revenues generated were to be retained at facility level and channeled back into staff incentives (50%) and operational costs (49%). Subsequently these proportions were amended to 60% and 39%. The intention was to reduce the actual costs of health care to the patient, enhance staff motivation, suppress unofficial fees, improve transparency, improve quality of care and improve access to public health services for the majority of the population, including the poor. The User Fees system included the right of facilities to grant fee exemptions to very poor patients, though in practice the exemptions system has worked poorly and has covered only a proportion of the genuinely poor.

The term ‘Contracting’ denotes a scheme in which government health services within one health district are managed and delivered by a non-government operator working under contract to the Ministry of Health (MOH), employing MOH staff under work-performance agreements. First trialed after 1998, Contracting now operates in 11 of Cambodia’s 76 health districts under the Health Sector Support Project (HSSP), with funding from the Asian Development Bank, World Bank, UK Department for

International Development and the UNFPA (a new phase of the HSSP project will begin in 2008). Contracting is designed to provide stronger management of service delivery and improved quality of care at government facilities. Previous evidence from the contracting pilots suggests that this is a cost-effective approach. One of the aims of Contracting is to improve health service delivery for the poor, and the scheme is targeted on poorer, more remote districts.

Introduced in numerous locations around Cambodia since 1999, HEF has been independently sponsored by a number of non-government organisations (NGOs) working to support the government health system. In principle, the HEF is a targeted social-protection scheme in which a fund is established as a third-party payer for indigent patients attending government health facilities. There is not a single, uniform model of HEF among the numerous schemes now in operation, but they do all share basic characteristics. The HEF generally operates at the district referral hospital, with financing provided mainly by donors, though funds may also be collected from the community. Generally, management is provided by an international NGO, which sub-contracts fund administration to a local NGO. The eligible poor are screened and means-tested at or prior to the point of service (known respectively as 'post-screening' and 'pre-identification'). The facility maintains a record of user-fee exemptions given to identified HEF patients and is reimbursed monthly from the fund. The local fund managers also act as advocates for the identified poor at the health facility and monitor the quality of care provided. The main aims of HEF are to reduce financial barriers, facilitate access to priority public health services, promote public health service utilization, reduce out-of-pocket health care costs, protect the poor from catastrophic expenditures, improve the quality of the public health services, and increase the accountability of service providers by giving a voice to service users.

Also introduced first in 1999, CBHI has grown more slowly than HEF and is currently provided by two independent NGOs in a small number of health districts. While there is little previous literature on this form of micro-insurance, the potential for growth is well recognized in Cambodia. CBHI is a voluntary, locally-based program provided by independent insurance funds for services provided at nominated government health facilities (in-patient and out-patient). Premiums are less than $2 per month per family maximum. Field agents are employed at village level to market policies, administer monthly premium collection at family level, and negotiate with facilities. CBHI operates as a third-party purchaser of health services, generally through a capitation payment made monthly in advance to the facility. CBHI therefore works to increase utilization of public health services, provides an additional source of revenue to facilities, and may act as a voice for patients, with financial leverage. While CBHI is a non-profit scheme it must achieve financial sustainability. It therefore requires a satisfactory quality of care from the facility and a clear referral system at primary-care level. In Cambodia, the MOH provides the regulatory framework for HEF and CBHI, which may one day be included within a broader social health insurance system.

3 Research methods

Phase 2 of the research uses case-study methodology to verify and deepen the analysis conducted in Phase 1. Two sites were chosen as case studies, an urban site in the capital Phnom Penh and a rural site in the health operational district of Ang Roka, two hours

drive south-east of the capital. The case-study approach makes use of a number of different quantitative and qualitative data collection techniques to gather information from a broad range of sources on access to health services for the poor. These are discussed below after first describing the main research questions and identifying the study sites. The different methods of data collection are used to triangulate the data in order to strengthen the reliability and validity of the findings.

3.1 Research questions

The purpose of the Phase 2 research was to gather detailed, in-depth information on demand-side issues related to access to health services and to test the conclusions drawn from data collected in Phase 1. The main research questions in Phase 2 were:

- Are user-fee systems applied appropriately?
- Do user fees exclude the poor from health services?
- Do exemptions, HEF and CBHI schemes provide increased access to services?
- Is the quality of care the same as for those who pay fees?
- What are the public perceptions of user fees, HEF, CBHI and health services?
- Are there significant rural-urban differences?

3.2 Study sites

The study sites in Phnom Penh and Ang Roka were chosen against a number of criteria designed to guarantee both the availability of reliable data and the coverage of the main supply-side and demand-side financing schemes that influence access to services for the poor. The criteria were:

- One urban and one rural site.
- A site that includes all schemes (User Fees, Contracting, HEF and CBHI).
- The site had reliable data on utilization, exemptions and revenues for at least the last five years.
- The site had reliable data on the implementation of HEF and/or CBHI arrangements for at least the last two years.

Phnom Penh:

Phnom Penh is a diverse urban location where both HEF and CBHI schemes are implemented through the Municipal Hospital.

In Phnom Penh, the study focused on the Municipal Hospital, which acts as the Referral Hospital for four ODs within the city, and seven health centers where HEF is provided. These health centers serve a population including a number of identified squatter settlements where poor and dispossessed families commonly reside. CBHI is offered under the SKY (‘Health for Our Families’) scheme with health services provided through a dedicated health centre (SKY Health Centre) located at the Phnom Penh Municipal Hospital (PPMH), including referral to the PPMH. No Contracting of health services was implemented at any of the ODs or facilities at the Phnom Penh site.

Ang Roka:

Ang Roka is a rural location and one of only two locations in country where Contracting, HEF and CBHI are implemented together through the Ang Roka Referral Hospital and health centres.

In Ang Roka, the study focused on the Referral Hospital (RH) and all nine health centres in the Operational District. Data were also collected from key informants at the Takeo Provincial Hospital, to which HEF and CBHI patients may be referred. HEF exemptions are funded by the provider (Health Net International/Action For Health) only at the Ang Roka RH and not at health centres; however, Swiss Red Cross (SRC) and other organizations reimburse health centres for fee exemptions they offer to HEF card holders at health centers. CBHI is offered also under the SKY scheme for health services provided at the RH and all nine HCs in the OD. Contracting of health services, covering the RH and all HCs, has been provided through two different organizations since 1999.

Figure 2 illustrates all 76 health Operational Districts in Cambodia, and identifies the two study sites. Annex F includes a detailed profile or each of the study sites, which are summarized briefly in Figure 3 below.

Figure 2. Operational Health Districts and Study Sites

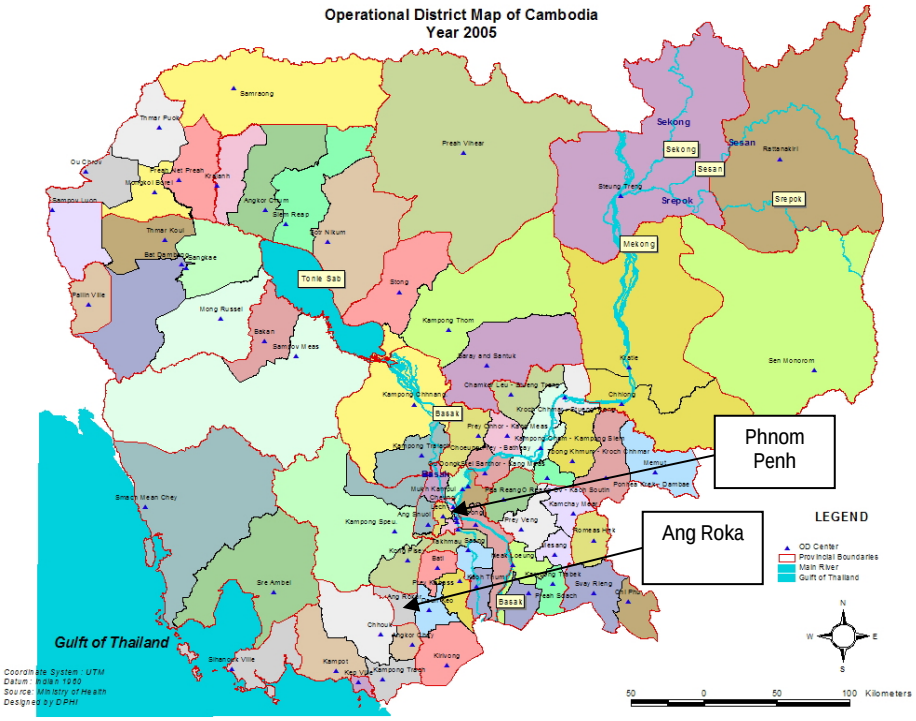


Figure 3. Study site profiles

	Phnom Penh	**Ang Roka**
Population	>1.3m. (in 4 ODs)	~130,000 (in 1 OD)
Poverty	~12% (>22 squatter settlements)	~30% (rural)
User fees began - Referral Hospital - Health centers	 1997 1998-2000	 2001 2001
HEF began	1999 (now at PPMH and 7 HCs,	April 2005 (RH only)

	incl. 6 settlements)	
SKY began	December 2005 (now >300 policy holders)	June 2001(now >3000 policy holders)
Contracting began	None	January 1999 (with AMDA; through SRC from 2004)

3.3 Data collection methods

In general, the Phase 2 study collected data (particularly, qualitative data) from both referral hospitals and health centres and from health administrators and scheme implementers. However, in general, the main impact of user fees and relief provided for the poor through HEF and CBHI is at referral hospital level. Health costs are greater and constraints on access for the poor are more evident at RH level than at HC level, where health costs are low. In Ang Roka, the formal HEF scheme was implemented only at the referral hospital. Quantitative data was collected only at the referral hospital level.

A wide range of data were collected for the Study using three main approaches: 1. A documentary analysis of all relevant reports and published literature on Contracting, HEF and CBHI in Cambodia; 2. A quantitative analysis of routine data of health facility utilization and revenues; and 3. A qualitative analysis of primary data collected from patient exit interviews, focus group discussions and key informants.

Documentary analysis

A complete documentary analysis of all relevant reports and published literature on Contracting, HEF and CBHI in Cambodia was completed for Phase 1 of the Study and a database of all relevant literature was constructed. For Phase 2, the literature analysis and the Study database were both updated, particularly for new materials published in 2006 and 2007. The documentary analysis provided the basis for focussing on the most important domains in the qualitative study.

Quantitative analysis

For the study sites – Phnom Penh and Ang Roka – the database of quantitative indicators constructed in Phase 1 was revised and updated. For Phase 2, routine quantitative data on referral hospital utilization and revenues were collected from the official Health Information System of the Ministry of Health. The main concern for quantitative data analysis was to measure levels of facility utilization and revenues and the impact of the different health-financing and pro-poor schemes.

The quantitative data was collected at referral hospital level in the two study sites using a number of key indicators, including:

- Monthly number of in-patient attending the hospital
- Monthly number of out-patients seeking consultations at the hospital
- Utilization of hospital capacity measured by the bed occupancy rate
- Hospital revenues from government budget, user fees and funded exemptions (HEF and SKY)

- The level of informal or 'other' exemptions (non-HEF or SKY) granted by the hospitals.

Additional routine quantitative data was collected from the international and local NGOs working as the managers and implementers of the HEF and SKY schemes covering:

- The level of HEF population coverage within the municipality or district
- The level of utilization of the hospital by HEF beneficiaries
- The number of enrolled SKY beneficiaries.

Qualitative analysis

Primary data was collected for the Phase 2 study through different qualitative methods, which included:

- Structured patient exit interviews at the referral hospitals and all health centres at the two study sites.
- Focus group discussions with HEF beneficiaries, SKY beneficiaries, and non-beneficiaries of any scheme at the two study sites.
- Key-informant interviews with MOH provincial and district health managers and staff and local and international NGO providers of Contracting, HEF and SKY programs at the two study sites.

Data collection instruments

Survey instruments were prepared for each of the various methods of data collection, as follows (copies of all data collection instruments are attached in Annex B):

- The questionnaire for collecting quantitative data on health facility utilization and revenues used for Phase 1 was used again for the Phase 2 case studies, updating and cross checking the data collected in the first phase. New data was collected from the MOH HIS. The range of data collected was extended from the previous three years used in Phase 1 back to the year 2000 or the earliest year for which data were available.

- A coded questionnaire was used for exit interviews with provision for open-ended replies to a number of 'closed' questions. The additional replies were post-coded and all data were translated and entered into SBSS for analysis. The exit interviews were treated as qualitative data and analysed against the coded responses. While frequencies were calculated to assess common patient responses, no formal statistical analysis was attempted as the sample and methodology did not support it.

- Separate open-ended question guides were prepared for each of the main areas for focus group discussions: HEF beneficiaries, CBHI beneficiaries, Non-beneficiaries. The focus group discussions were conducted in Khmer and were led by researchers from the Centre for Advanced Studies. Each FGD was digitally recorded, transcribed by staff from the MOH and CAS, and translated into English for analysis.

- A question guide was prepared for each of the main key-informant groups: MOH administrators and staff, Contracting managers, managers of HEF schemes, and managers of CBHI schemes. The instruments were used as a guide for semi-structured, open-ended interviews. The interviews were conducted by the research team in Khmer for all MOH staff and Khmer-speaking scheme managers and in English for managers of international NGOs. The interviews were digitally recorded, transcribed and (where necessary) translated into English for analysis. The analysis was conducted using identified key themes to sort responses.

3.4 Selection of respondents

Data were collected from the main health providers, official records and from respondents selected as exit interviewees, focus group attendees and key informants. Quantitative data were collected from the MOH Health Information System for each of the referral hospitals (Phnom Penh and Ang Roka). For the qualitative research, the aim was to survey a sufficient number of respondents through key informant interviews, focus group discussions and exit interviews to get a complete and accurate view of the situation.

Sites for data collection for the qualitative aspect of the study included the Municipal Health Department (MHD), the Phnom Penh Municipal Hospital and all seven health centres in the Municipality supported by HEF schemes. In Ang Roka, the sites for qualitative data collection included the Provincial Health Department (PHD), Provincial Hospital, OD office, Referral Hospital and all nine health centres in the OD.

A detailed account of the number and composition of all exit interviews, focus groups discussions and key informant interviews is provided in Annex E. Data was collected as follows:

Patient Exit Interviews

The aim was to interview all daily visitors to the referral hospital and all health centres at each site on the days allocated to data collection (four days at each referral hospital and one day at each health centre in both locations). The number of respondents to be targeted was calculated on the basis of an estimation of the actual average daily number of IPD and OPD patients attending the facilities.

Exit interviews conducted:

Total number	n = 679 (PPMH and seven HCs; ARRH and nine HCs)
Phnom Penh	n = 429 (PPMH = 200; total of seven HCs = 229)
Ang Roka	n = 250 (ARRH = 100; total of nine HCs = 150)

Focus Group Discussions

Respondents were chosen from three different categories at each site: HEF beneficiaries, SKY beneficiaries, and non-beneficiaries of either scheme. To reduce bias and increase coverage, two focus groups were formed for each of these three categories at each site. The selection of participants for focus groups was arranged by the NGO providers under criteria established by the research team. In each group the participants were to include a

representative number of participants by sex, by age and by occupation designed as far as possible to reflect the communities from which they came.

Focus Group Discussions:

A total of 12 different focus groups (6 Phnom Penh, 6 Ang Roka)
Including 2 focus groups in each location for HEF beneficiaries, CBHI beneficiaries, and non-beneficiaries
Total number of participants: 166 (78 in Phnom Penh, 88 in Ang Roka, an average of 14 per group)

In Phnom Penh, FGD participants were chosen as follows:

- HEF beneficiaries: Two groups arranged by field workers from USG including registered HEF beneficiaries from a more remote site adjacent to Anlong Kngan Health Centre in Group 1 and from two sites more central to the city near to Boeungkak and 7 Makara health centres in Group 2.
- SKY beneficiaries: Two groups arranged by field workers from GRET, Group 1 made up of formal-sector workers in full-time paid employment and Group 2 made up of informal-sector workers with no regular formal employment.
- Non-beneficiaries: Two groups also arranged by field workers from USG including people without HEF or SKY coverage from the more remote site at Anlong Kngan in Group 1 and from the two sites more central to the city at Boeungkak and 7 Makara in Group 2.

In Ang Roka, FGD participants were chosen as follows:

- HEF beneficiaries: One group arranged by field workers from the HEF provider (Action For Health – AFH) at the Ang Roka RH to assess conditions in the OD and one group arranged by the HEF provider at the Takeo Provincial Hospital (Cambodia Family Development Services – CFDS) to assess the strength of the referral system.
- SKY beneficiaries: Two groups arranged by field workers from GRET (the French NGO managing the scheme), one at the Tram Kak health centre and one at the Prey Chour health centre.
- Non-beneficiaries: Two groups also arranged by field workers from SRC including people without HEF or SKY coverage, one at the more remote village at Trapeang Chouk and one at the Takeo Provincial Hospital.

Key Informant Interviews

Key Informant Interviews were held with Provincial and District Health Department staff and with hospital and health centre directors in both locations and with managers from the NGO service providers. All key leaders of these organizations were interviewed.

Key Informant Interviews:

In Phnom Penh: 22 key informant interviews (including MHD directors, PPMH directors, OD directors, HC directors and NGO managers and providers)
In Ang Roka: 20 key informant interviews (including PHD directors, Provincial Hospital directors, RH directors, OD directors, HC directors and NGO managers and providers)

All interviews with Cambodian staff were conducted in the Cambodian language. These interviews were carried out by Central Ministry of Health staff under the supervision of the Chief Investigator. Key Informant Interviews with directors and managers of all foreign and local NGOs providing Contracting, HEF or CBHI services were conducted by the Chief Investigator in English or in Khmer through a translator. All interviews were electronically recorded and transcribed and where necessary were translated into English. Transcription and translation were carried out by researchers from the Ministry of Health and Research Assistants under the supervision of the Chief Investigator.

3.5 Triangulation

This was not a sample survey producing statistical results but a case study based on the use of a number of different techniques of quantitative and qualitative data collection. To establish the validity and reliability of the findings, the data from all sources – the quantitative data from health facility records as well as the qualitative data from key informant interviews, exit interviews with facility users, and focus group discussions – will be triangulated. Only those conclusions that were reliably substantiated by this process of cross-checking and validation are reported.

3.6 Ethics Approval

Approval from the Research Ethics Committee of the Ministry of Health for the qualitative research involving human subjects (key-informant interviews, focus group discussions, and exit interviews) was sought and granted. All interview and focus-group respondents were provided with a plain-language explanation of the research and gave their informed consent to participation in the research. Those not willing to participate (particularly in exit interviews) were recorded as ‘non-respondents’. A copy of the ethics approval is attached in Annex A.

A plain language ‘Respondent Information Sheet’ was prepared and issued to data collectors, who were trained in its use at Training Workshop sessions. A ‘Statement of Informed Consent’ was also prepared to guide data collectors in the requirements for ensuring that all respondents were well informed, clear about the purposes and methods of the study and the use of data, and confident that their anonymity would be guaranteed.

Additionally, with the support of the Secretary of State for Health at the central MOH, notices were issued to all MOH units participating in the study at Provincial and OD level ensuring them that their cooperation was authorized by the Ministry and that they were free to participate openly in responding to the data collection activities. Within the context of the Cambodian civil service this arrangement is common and accepted practice and necessary to the implementation of research projects like this one.

As some respondents were civil servants and many EI and FGD respondents were likely to have limited literacy skills, there was a requirement on the part of data collectors that they explain clearly to respondents the nature of the research and that they get their verbal agreement to participate. On the EI questionnaire, for example, the first question was: "Do you agree to participate in this interview?" A similar process was followed in the selection of FGD participants.

4 Data collection

The research team spent five days in Phnom Penh and four days in Ang Roka OD to collect the qualitative data, with additional time spent collecting key-informant interviews from NGO personnel based in Phnom Penh and the HIS quantitative data. Copies of the schedules for data collection activities in Phnom Penh and Ang Roka are attached in Annex C.

4.1 The data collection team

Data collection was completed in Phnom Penh from 9 to 13 October and in Ang Roka from 20 to 23 November. The data collection team comprised the following staff:

- The Chief Investigator (Peter Annear)
- The WHO health financing advisor (Maryam Bigdeli)
- The director and four staff of the MOH Health Economics Bureau (Ros Chun Eang, Ngin Seilaphiang, Thor Bony, Kim Lunsithan, Phum Phat)
- One research associate (Men Rithy Chean)
- Eleven researchers from the Centre for Advanced Studies
- A research assistant (Phy Sopheada).

4.2 Training workshops

Two training workshops were held to prepare the research team for data collection tasks in Phnom Penh and Ang Roka OD.

Phnom Penh

The first workshop was held at the MOH and (for the final half day) the CAS office in Phnom Penh during 3-5 October to prepare for data collection in Phnom Penh.

The workshop was attended by:

- Peter Annear (Chief Researcher)
- Maryam Bigdeli (WHO advisor)
- Ros Chun Eang, Ngin Seilaphiang, Thor Bony, Kim Lunsithan (Health Economics Bureau)
- Kunthea and Ny (SKY insurance)
- FGD facilitators: Khat Sokha, Invong Sovuthikar, Bou Chamroeun (CAS)
- Exit interviewers: Mao Sophon, Ban Ravuth, Khun Davy, Mut Savroth, Ou Sirren, Touch Vannaroth, Uk Thary, Uk Lekhana (CAS)
- Men Rithy Chean (Research associate)

- Phy Sopheada (Research assistant)

The agenda for the workshop included:

- Research project summary and introduction
- Review of research documents
- Research calendar for October and November
- Site visit schedule of activities and arrangements
- Interview teams: Quantitative data., KII, FGD, and EI
- Ethics approval, plain language statement and informed consent
- Recording and transcription of interviews
- Procedures for quantitative data collection
- KII schedule and timing
- FGD arrangements, schedule, location and timing
- FGD questionnaire
- EI targeted number of respondents, arrangements, schedule and timing
- Exit interview questionnaire

The Powerpoint summary presentation made at the workshop is attached as Annex D. The workshop was used to familiarize data collectors with the data collection instruments and train them in data collection techniques. All those from the MOH and CAS responsible for collecting data were trained researchers with previous data collection experience. All data collectors for the focus group discussions and exit interviews (principally the researchers from CAS) were taken through each question in the questionnaires to clarify the details and the particular purposes of each question. Questionnaires for key informant interviews were also discussed with interviewers (the Chief Researcher and staff from the Health Economics Bureau). The instruments were corrected where any lack of clarity was discovered.

Ang Roka OD

The second training workshop was held at the MOH in Phnom Penh on 17 November to prepare for data collection at Ang Roka OD.

The workshop was attended by:

- Peter Annear (Chief Researcher)
- Maryam Bigdeli (WHO advisor)
- Ros Chun Eang, Thor Bony and Phum Phat (Health Economics Bureau)
- FGD facilitators: Khat Sokha, Invong Sovuthikar, Bou Chamroeun (CAS)
- Exit interviewers: Mao Sophon, Ban Ravuth, Khun Davy, Mut Savroth, Ou Sirren, Touch Vannaroth, Uk Thary, Uk Lekhana (CAS)
- Phy Sopheada (Research assistant)

The agenda for the workshop included:

- Introduction to Ang Roka OD
- Site visit schedule of activities

- Travel arrangements and accommodation to and within Takeo and Ang Roka
- Interview teams: Quantitative data collection, KII, FGD, EI
- Ethics approval, plain language statement and informed consent
- Recording and transcription of interviews
- Quantitative data collection: PHD, OD, RH
- KII interviewers and arrangements
- KII training
- FGD meetings and arrangements
- FGD questions and discussion
- EI targeted number of respondents and arrangements
- EI questions and discussion

The Powerpoint summary presentation made at the workshop is attached as Annex D. The workshop was used to retrain data collectors in the use of the various questionnaires and to address any difficulties found during Phnom Penh data collection. Additional training was provided for the exit interviewers, FGD facilitators and the KII interviewers.

4.3 Data collection activities

Quantitative data were collected for the Phnom Penh Municipal Hospital and the Ang Roka Referral Hospital from the official MOH Health Information System in Phnom Penh by researchers from the Bureau of Health Economics and entered into the Access Study database for analysis.

Details of the location and number of respondents for all key informant interviews, focus group discussions and patient exit interviews are included in Annex E.

4.4 Data entry and analysis

Data entry was completed by 31 December 2006 and the checking, cleaning and correction of the data was completed by March 2007. The following aspects of data entry were completed:

- Quantitative data from the health centres and referral hospitals in Phnom Penh and Ang Roka were entered by the staff of the BHE into the electronic database created for the Access Study.
- Researchers from CAS entered, cleaned and corrected all data from the patient exit interviews in both Phnom Penh and Ang Roka into the SPSS data-analysis program and preliminary analysis was completed by the Chief Investigator.
- Focus group discussions in Phnom Penh and Ang Roka, all of which were recorded in Khmer, were transcribed and translated by staff from the BHE, from CAS and by the Research Assistant.
- Key informant interviews from Phnom Penh and Ang Roka recorded in Khmer were transcribed and translated by staff from the BHE, from CAS and by the Research Assistant. Those recorded in English were transcribed by the Chief Researcher.

All data analysis was carried out by the Chief Investigator with help from two research assistants.

Quantitative data

Interpretation of the quantitative data involved a time-series analysis of trends in major indicators of utilization, revenues and exemptions for each case study to identify the impact of the various schemes on access to health services.

Key informant interviews

Analysis of the qualitative key-informant interviews investigated key themes related to the nature of each scheme, the role it plays in service provision at the facility, the attitude of health staff to the schemes, and patient satisfaction.

Focus group discussions

Data from the various FGDs was stratified by HEF and SKY beneficiaries and non-beneficiaries and analysed according to key themes related to individual and community knowledge and affordability of user fees, reasons for exclusion from benefits, satisfaction with HEF and SKY benefits, and satisfaction with services delivered through health facilities.

Exit interviews

All exit interview data was coded, entered into and analysed using SPSS, using standard tools estimating frequencies and cross referencing on issues related to the profile of the patient, impact of user fees, availability of HEF or SKY, and health seeking behaviour. As no formal representative random sample was selected, this was not a formal statistical analysis and no statistical breakdown is presented. Rather, SPSS was used as a tool to investigate themes and trends in the qualitative analysis.

Previous data

Where available, the Study made use of existing or previous data collection on relevant issues, including the following quantitative and qualitative sources.

- Access Study Phase 1 OD utilization database.
- Data collected for case study evaluations in Phase 1
- Data collected by HEF/CBHI implementers (including the USG Phnom Penh database and the AFH Ang Roka database)
- KII with stakeholders in Phnom Penh and Ang Roka conducted in Phase 1 of the Access study.
- Semi-structured interviews with urban households in debt for health care in Boeungkak and Tonle Bassac squatter areas (from Phase 1).
- Exit interviews conducted by CAS and funded by URC at the Phnom Penh Municipal Hospital.
- Exit interview with SKY beneficiaries in Phnom Penh conducted by GRET.

Findings from the Access Study will be used to support, a number of planning activities conducted through the MOH, including:

- Development of the MOH Health Strategic Plan 2008-15.

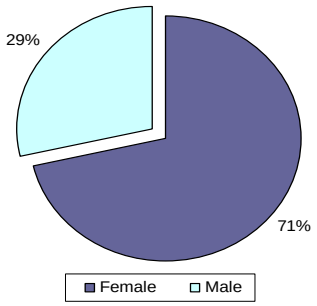
- Development of the MOH Strategic Framework for National Health Financing 2008-15.

5 Profile of interviewees and informants

The composition of the interviewees and informants selected for the study conformed as closely as was possible to the profile of health service users and providers in the wider community.

Gender: The main users of public health services are women and their children, and this is reflected too in the number of patients who use HEF or SKY to access services. HIS data presented in Figure 1 indicates that 71% of out-patients attending the Phnom Penh Municipal Hospital (PPMH) are female, a common result across most referral hospitals in Cambodia. Between 64% and 79% of the patients providing exit interviews at the referral hospitals and health centres in Phnom Penh and Ang Roka were also female. Overall, 42% of respondents were women aged 15-44 years, and 25% of respondents had attended the surveyed facilities for maternal care or deliveries. The evidence suggests that HEF and SKY cater adequately for women as the prime users of facilities (overall, 76% of exit interviewees with HEF patients and 63% with SKY patients were women).

Figure 4. Per cent of IPD discharges by gender: PPMH January-December 2006



Source: HIS data collected by the MOH

Main illnesses: Along with maternal and child health, illnesses related to gastric disorders, diahhrea, fever and related symptoms were the main causes of seeking treatment among patients providing exit interviews. About 3-in-10 patients presented for MCH care and 3-in-10 for gastric or similar disorders. The use of the PPMH for MCH care was particularly strong, but the hospital director confirms that HEF and SKY patients present for “all kinds of diseases ranging from delivery, general disease, operation, and so on”. One-third of all exit interviewees were in-patients and two-thirds outpatients.

HEF and SKY beneficiaries: Among all patients providing exit interviews about 21% were HEF beneficiaries and 8% SKY beneficiaries. SKY beneficiaries were more heavily represented at Ang Roka facilities with almost 16% of respondents compared to 14% for HEF (in Phnom Penh 24% were HEF beneficiaries and only 5% SKY beneficiaries). These figures are consistent with IPD and OPD attendances at these facilities (see Access and Utilization below). Among the FGD respondents, about a third were HEF beneficiaries, a third SKY beneficiaries and a third non-beneficiaries, reflecting the selection of participants in three equal groups.

Key informants: Key informants represented the health providers, health administrators and benefit providers. There were 48 key informants in total, 28 from Phnom Penh and 20 from Ang Roka. Only four of the key informants were women. Overall, 17 of the informants came from municipal or provincial level (including provincial administration and provincial hospital), 7 came from the district level (including OD administration and referral hospital), 17 were health centre directors, and 12 were from local and international NGOs.

6 Findings: analysis and discussion

In the following analysis, we present findings that were validated by the triangulation of the different data collection methods and highlight any further issues that require more investigation. The research findings are analysed according to a number of key domains including:

- Population coverage
- Access to services
- Utilization of public health facilities
- Contracting of health services
- User fees and supplementary revenues
- Under-the-table charges
- Fee exemptions for the poor
- Staff behaviour
- Fairness and stigma related to HEF
- Debt and asset sales for health care
- Contrasts and comparisons.

In this analysis we are concerned mainly with the impact of the demand-side financing schemes on access to health services by the poor, including HEF, which targets the poorest sections of the community, and CBHI (in the form of SKY insurance), which targets the not-so-poor. The supply-side initiatives – user fees and Contracting – are considered to the extent that they provide a context for the pro-poor schemes and have an impact on access to health services.

NB. In the discussion below the results of the patient exit interviews are frequently reported as percentages. This is not to be read in any way as a valid statistical outcome, as the exit interviews were conceived as qualitative research. The numbers are presented here only to give an indication of the trends revealed during the interviews.

6.1 Coverage of pro-poor schemes

Phnom Penh is an urban setting in which the poorest people are mainly found in defined squatter settlements around the city. Through the Municipal Hospital and selected health

centres, sections of the population are served by HEF and CBHI schemes. Ang Roka is a rural district with a higher average level of poverty and a more homogenous population. Through the referral hospital and health centres, the OD population is served by HEF and CBHI schemes, supported by district-wide Contracting of service delivery. Official user fees apply in both locations.

Population catchment

Phnom Penh: Because Phnom Penh is a large and demographically diverse city in which the Municipal Hospital serves four different health Operational Districts (ODs), it is difficult to calculate the exact population catchment area. However, the population of Phnom Penh is growing, and now exceeds 1.3 million. Official figures estimate that 12% of the population of the central OD in Phnom Penh (Kandal OD[1]), where the Phnom Penh Municipal Hospital is located, are poor. The poorest areas in the city include 22 recognised squatter settlements. Due to its limited resources, the HEF scheme currently targets the poor living in only six of these settlements. The population catchment for the SKY community-based insurance scheme is city-wide and defined by the number of formal and informal sector workers living in the city, and is impossible to calculate precisely.

Ang Roka: Ang Roka is a single OD with a more homogenous rural population of approximately 130,000. The OD population provides a common catchment area for both HEF and SKY, each of which targets a different population segment (the 'very poor' and the 'not-so-poor'). The level of poverty in Ang Roka was estimated at about 30% of the OD population by the first NGOs to work there as HEF providers – the Asian Medical Doctors Association (AMDA) and the Centre d'Etude et de Développement Agricole Cambodgien (CEDAC).

Identified HEF beneficiaries

Phnom Penh: As recorded in the data base of registered HEF beneficiaries maintained by the Phnom Penh HEF provider, the Urban Sector Group (USG), the total number of pre-identified beneficiaries in Phnom Penh was almost 12,000 families or 56,000 individuals by September 2006. This number is likely to expand with ongoing pre-identification carried out by USG. Even so, HEF coverage in Phnom Penh is limited to only six of the 22 potential settlements where most poor people live. The Director of the Phnom Penh Municipal Hospital (PPMH) confirmed that he was not prepared to send poor patients from outside these areas who present at the hospital to apply for HEF cards with USG because of this limitation.

Ang Roka: The current HEF manager, Health Net International (HNI), has estimated that the poorest 29% of the population (or approximately 38,000 people) are registered HEF beneficiaries, although other key informants estimated the number of pre-identified HEF beneficiaries at only 17% of the population and considered this to be well below the poverty rate. Key informants explained that, because the previous pre-identification had not been completed in Ang Roka, reaching only about two-thirds of the population, a

[1] Kandal OD in the Phnom Penh municipality should not be confused with Kandal Province, where GRET operates a CBHI scheme at Roulos HC in Takmao OD.

review and re-identification was planned, and cost-effective community-based methods involving the local authorities would be used to do this.

SKY beneficiaries in Phnom Penh and Ang Roka

In Phnom Penh the SKY target population is difficult to define precisely but is found among the city's formal- and informal-sector workers. The number of SKY policy holders in Phnom Penh was recorded as 335 by January 2006 and was growing. Plans to expand the risk pool (and the number of enrolled members) for the Phnom Penh SKY scheme through new arrangements with employers to cover the employees (predominantly women) of the city's large garment industry, were being prepared. In Ang Roka, there were 3269 SKY policy holders by January 2006. SKY managers explained that the scheme does not provide "free" care but rather "pre-paid" care and that it targets (in rural areas) the 50-60% of the population who sit on the income scale just above those identified as eligible for HEF.

6.2 Access to public health facilities

Access to public health services here is understood to mean the ability to attend the HC or RH facilities at the time of sickness at an affordable cost and without the unavoidable need to borrow money or sell assets.

Comparative role of HEF and SKY

The evidence suggests that HEF and SKY are effective in providing access to health services for the poor and the near-poor. Of the patients who participated in exit interviews, approximately 30% in both Phnom Penh and Ang Roka had received benefits from HEF or SKY.

Between Phnom Penh and Ang Roka, there was a notable difference in the proportion of exit interviewees who had HEF benefits and those who had SKY benefits. In Phnom Penh, a larger proportion of exit interviewees had HEF, while in Ang Roka the proportions of interviewees coming from the two schemes were roughly equal in number (the proportions are summarised in Figure 1).

Figure 5. Exit interviewees: patients with HEF or SKY

	Total n = 679	Phnom Penh n = 429	Ang Roka n = 250
Patients with HEF	21%,	24%	16%
Patients with SKY	8%	5%	14%

This difference in proportions between the two sites may be due to a number of factors. It should be kept in mind that HEF began earlier and SKY began only recently in Phnom Penh while in Ang Roka SKY began earlier and HEF began only recently. In Phnom Penh, HEF covers the Municipal Hospital and seven health centres; in Ang Roka, the formal HEF scheme is available only at the referral hospital. The different levels of HEF and SKY beneficiaries could be due to chance, to particular circumstances at the time of the interviews, or it may reflect differences in the targeting, administration and outreach activities of HEF and SKY implementers in the two locations.

Even so, in Ang Roka, the number of exit interviewees who had HEF benefits was less than would be expected given the relative level of poverty. In Phnom Penh, however, it is likely that the number of exit interviewees with HEF was more-than-proportional to the number of poor in Phnom Penh generally (which was to be expected as HEF supports the Phnom Penh MH by targeting poor communities).

Key informants at Phnom Penh MH confirmed that the hospital focuses on the poor, who generally cannot afford to access national hospitals or private services. One said:

> *Once in a blue moon [a poor person may] go to get service in a private clinic, because our hospital is able to attract more customers since our hospital is clean, the services is provided 24 hours, and the behaviour of our staff is good. I think that the poor aren't able to go to private health services because they are very expensive, and of course they mostly come to our hospital, while the rich might say that our services are not good enough to be accepted, so they might go to get services in the private clinics or national level facilities. For the poor, it's clear that 99% come to be treated in our hospital.*

Directors of the seven health centres in Phnom Penh where HEF was provided through USG confirmed that the number of clients had increased. According to one, this was "because of the financial assistance from USG", and other exemptions were provided to clients where necessary. One HC director said:

> *I think that about 80 to 90 percent of the poor get health care services at the health centre because they do not have the possibility to get their health care services in private clinics. Even though our health centre provides limited medical care for them they still come to the health centre.*

Access to new users

There is evidence that HEF and SKY provided access to public health services for people who did not previously have it.

Perhaps the most important finding in the research is that HEF alone appears to give access to health services to poor people who had previously been excluded because they could not afford to pay the user fees and related costs.

On the other hand, it appears that SKY had encouraged people who previously used alternate (often private) providers to move to public health facilities, or enabled them to reduce the burden of borrowing for health costs.

Exit interviews: Returns from exit interviews show that about a quarter of respondents receiving either HEF or SKY did not previously attend the facility, with the strongest response at the Phnom Penh Municipal Hospital (Figure 2).

For HEF beneficiaries, the most common reason given for not previously attending the facility was the lack of money to pay user fees and other costs of seeking treatment. For SKY beneficiaries, the main reason given for not previously attending was that they did not know the facility or used another facility, and only one respondent (at the SKY Health Centre in Phnom Penh) said they did not previously use the facility due to the lack of money.

Figure 6. Exit interviewees: patients who did not attend the facility prior to having HEF or SKY

	Phnom Penh		Ang Roka	
	MH	HC	RH	HC
	n = 50	n = 54	n = 18	n = 21
HEF beneficiaries	30%	26%	22%	nil
	n = 8	n = 13	n = 14	n = 22
SKY beneficiaries	25%	62%	0%	18%
Of which: did not attend due to lack of money				
HEF beneficiaries	n = 15	n = 14	n = 4	n = 0
	60%	50%	25%	n.a.
SKY beneficiaries	n = 2	n = 8	n = 0	n = 4
Due to lack of money	0%	13%	n.a.	nil

These results were confirmed during the focus group discussions.

Focus Group Discussions: Health seeking behaviour prior to having a HEF or SKY benefit differed between the different social groups (poor HEF beneficiaries, less-poor SKY beneficiaries, and non-beneficiaries).

HEF beneficiaries:

Among the HEF respondent groups in Phnom Penh there was a feeling they generally could not access the hospital (and some had never attended) because the fees were too high, but sometimes they were forced to use the MH or other hospitals for serious illnesses or life-threatening emergencies. One said: “We all are poor, if the user fees are too high, we really cannot go”.

In Ang Roka, some respondents said they used nearby private providers, some had used public facilities and payed the scheduled fee, and others had used the Takeo Provincial Hospital (which provides extensive care with exemptions). However, once they had a HEF card, most respondents said they used the HC or RH.

SKY beneficiaries:

Among the SKY respondent groups in Phnom Penh, many participants from the informal sector said, prior to having insurance coverage, they had attended the Municipal Hospital for serious illnesses even though the costs were high. One said “Before having the card, I used to bring my child to the hospital, although the user fees are too high, because I couldn’t avoid it; I decided to borrowed money at interest from others to pay for her treatment.” Many used alternate providers, including the private Samdech Ouv Hospital (HOPE), some went to health centers, and others used private clinics or self medication. Among formal sector workers, with relatively more money, it was common they had not previously used MH but instead used private pharmacies for self medication

In Ang Roka, it was common for SKY respondents to have attended the HC or RH prior to having the SKY card because for them fees were less of a barrier.

Non-beneficiaries:

Among the non-beneficiary groups in Phnom Penh (who generally did not qualify for HEF as they were not regarded as poor), fees were not considered to be such a barrier to using the hospital, where the main problem was thought to be the quality of care and the availability of medications. Some used private clinics.

Among the non-beneficiary group at Tropeang Chouk in Ang Roka (a poor village without HEF or SKY coverage), user fees were generally regarded as a barrier to accessing the HC or RH and the first point of service was often a traditional healer. Most had to borrow money or sell assets to attend the HC or RH. Some regarded the fees at health centres as cheaper that the alternatives, others chose private providers.

6.3 Utilization at referral hospitals

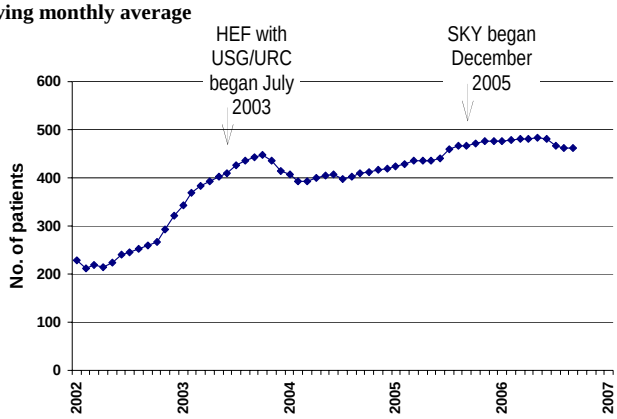
Utilization of referral hospital services is understood here to mean the recorded monthly level of IPD (in-patient) numbers and the recorded level of OPD (out-patient) numbers attending the facility.

In-patient and out-patient numbers

Data from the MOH Health Information System (HIS) confirm that the utilization of referral hospitals in Phnom Penh and Ang Roka has steadily increased. In recent years both in-patient and out-patient attendance at the two hospitals has grown significantly, as illustrated in Figures 3-6.

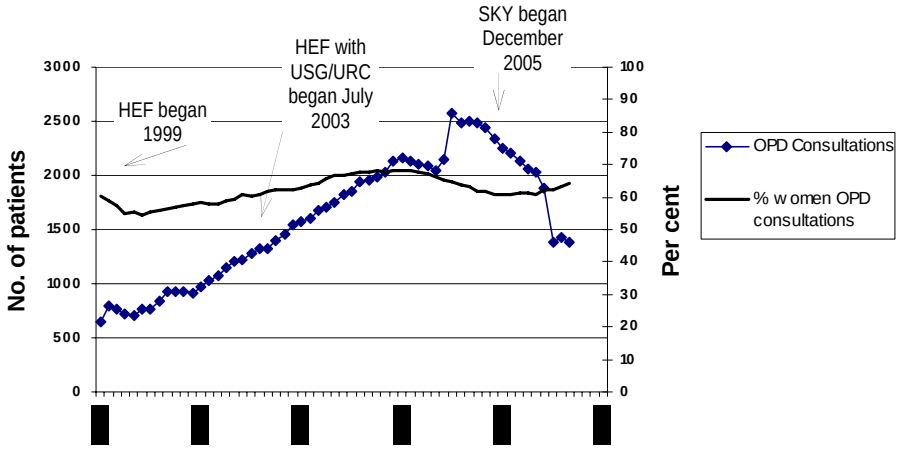
Phnom Penh:

Figure 7. IPD discharges, Phnom Penh MH
Moving monthly average



Source: HIS data from MOH

Figure 8. OPD consultations, Phnom Penh MH
Moving monthly average



Source: HIS data from MOH

In principle, the increase in patient numbers may be due to a number of causes, including increasing living standards and improved service provision generally. However, increases like this have not been seen generally in MOH referral hospitals that do not receive external support or do not have HEF or other forms of demand-side financing. It therefore appears that HEF, and later SKY insurance, have had a positive effect on utilization at the Phnom Penh MH, especially after 2003. (With USAID funding through the University Research Company/URC, the USG began the management of the HEF scheme in 2003).

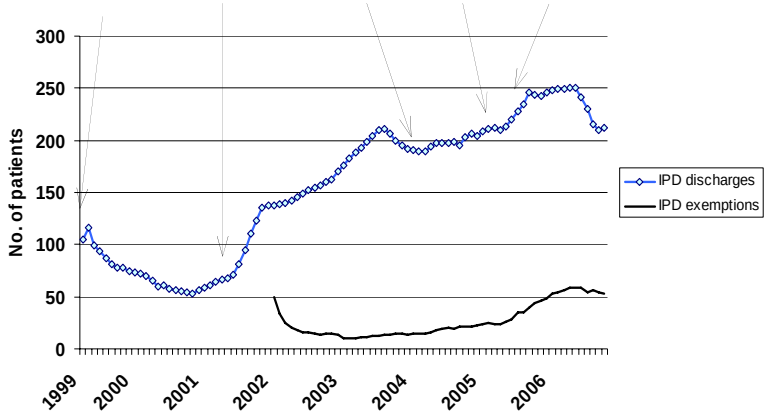
OPD consultations have also risen steadily at the Phnom Penh MH, reflecting improved access to services. While absolute numbers have increased, the proportion of women using these services has remained fairly steady at 60-70% of consultations. From 2005 the level of OPD consultations has moderated, perhaps reflecting the improved services at health centres in the catchment area.

Ang Roka:

In-patient numbers have also risen steadily at Ang Roka RH, especially since 2001, assisted by an active SKY program and significantly boosted again in 2005 by the introduction of HEF. Also contributing to the improvement in the hospital performance was the introduction of Contracting in 1999, which provided additional resources and strengthened hospital management. The number of hospital beds (non-TB) increased from 17 in 1999 to 30 from May 2002, thus increasing the hospital's in-patient capacity. As well, the level of total IPD fee exemptions (HEF and other exemptions) seems to have risen with the introduction of HEF, reflecting improved access for the poor.

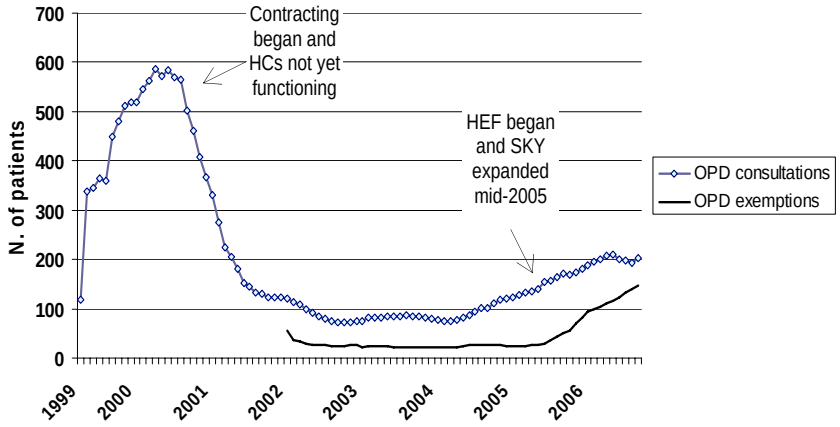
Figure 9. IPD discharges, Ang Roka RH
Moving monthly average

Contracting began with AMDA January 1999	SKY began at one HC June 2001	Contracting began with SRC March 2004	HEF began at RH only April 2005	SKY expanded to nine HC June 2005



Source: HIS data from MOH (excluding TB cases)

Figure 10. OPD consultations Ang Roka RH
Moving monthly average



Source: HIS data from MOH

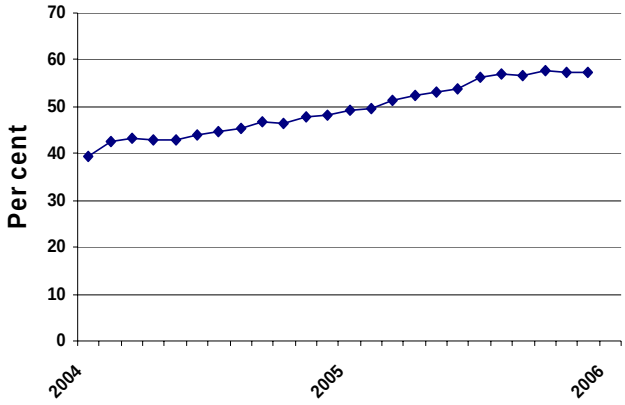
The level of OPD consultations at Ang Roka RH also rose from 2003 (Figure 6). Local stakeholders attributed the sharp bulge during 1999-2001 to a number of critical changes at the time: (i) Contracting had begun with AMDA; (ii) All patients were exempted from user fees; (iv) Construction or renovation of the OD's nine HCs had not been completed; (v) There were not enough staff at HCs until 2001-2002; and, (vi) There was no referral system in place. Significantly, it appears that for OPD consultations, as for in-patient services, the number of exemptions has risen noticeably with the introduction of HEF.

Hospital capacity

These increasing levels of utilization at both hospitals has been reflected in a fuller use of existing capacity in recent years in both Phnom Penh and Ang Roka, as Figures 7 and 8 illustrate. With 150 beds, the Phnom Penh MH is less fully utilized and has room to expand patient intake with further support from HEF and SKY. Despite the increase in

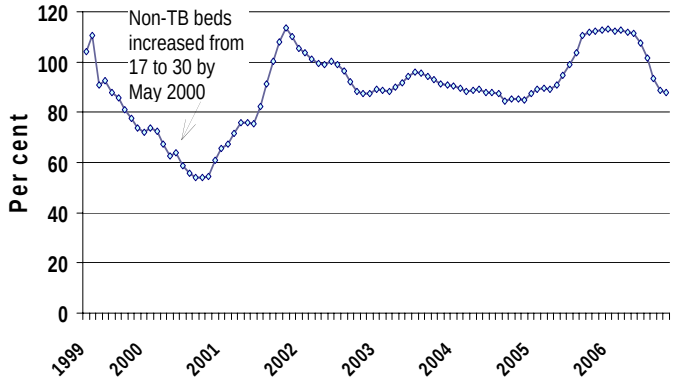
capacity at Ang Roka RH from 17 to 30 beds, hospital capacity appears fully utilized and may require expansion if patient numbers further increase as HEF expands.

Figure 11. Bed occupancy rate, Phnom Penh MH
Moving monthly average



Source: URC data

Figure 12. Bed occupancy rate, Ang Roka RH
Moving monthly average



Source: HIS data from MOH (excluding TB cases)

HEF and SKY hospital users

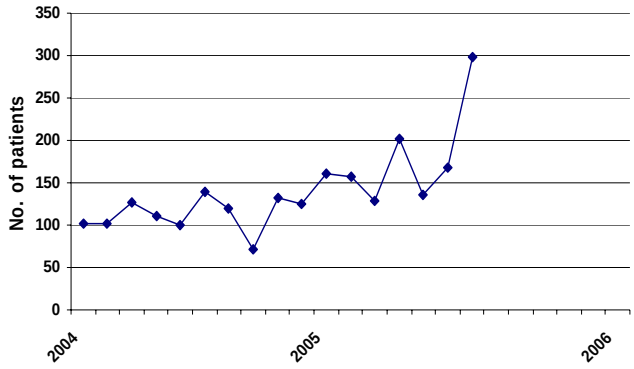
It appears that HEF and SKY are bringing more people into public health facilities. For example, at the Phnom Penh MH key informants confirmed that facilities had been expanded to cater for the increase in patient numbers and the numbers of consulting tables had been increased from 47 to about 54: One key informant said that, "After the implementations of both HEF and SKY schemes the use of examination table has been augmented every month or even every year". The Phnom Penh MH Director confirmed that:

> *The number of patients has increased a lot. For example, the number of HEF patient is over 100 per month and the number of SKY patient is about 30-40 per month*

[including IPD and OPD]. There are many patients also coming through other NGOs [such as Friends]. I guess that about 30-40% of patients being treated in this hospital were sent by NGOs. We can earn about 15 million Riel per month for such patients out of total revenue of 40 million Riel, so it might be one third of the total revenue.

This judgement is confirmed by a rising number of HEF-supported IPD admissions at the Phnom Penh MH (Figure 9). Between March 2004 and July 2005 HEF-supported admissions at the Phnom Penh MH average 31% of total admissions.

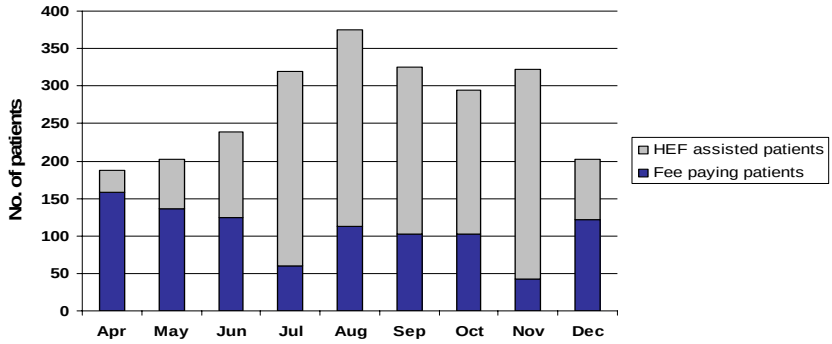
Figure 13. Number of HEF-supported IPD admissions, Phnom Penh MH
Actual number admitted per month



Source: URC data

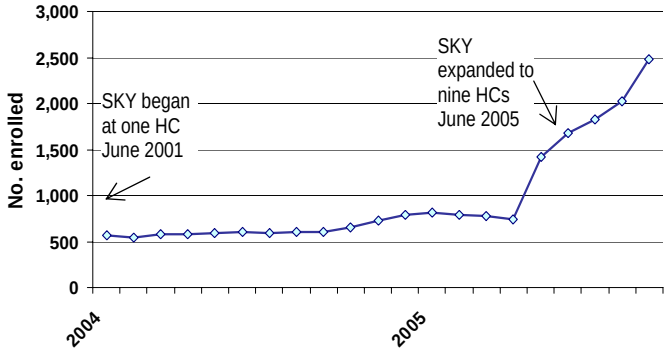
In Ang Roka too, the proportion of in-patients receiving support from HEF rose rapidly after its introduction in April 2005 (Figure 10). Between April and December 2005, the number of in-patients receiving support from HEF averaged 64% of total hospital in-patient numbers. The number of enrolled SKY members rose suddenly too in 2005, assisted by the expansion of the scheme to all nine health centres in the OD (Figure 11).

Figure 14. Fee-paying and HEF-assisted patients, Ang Roka RH 2005



Source: HNI data, HEF Forum presentation 2006

Figure 15. Number of SKY members enrolled, Ang Roka OD



Source: Data from GRET (a)

Whether the HEF and SKY are contributing to a greater use of public health facilities as the first point of service in the case of illness in Phnom Penh and Ang Roka is still to be determined. However, at the time of data collection, a large proportion of the patients who participated in exit interviews had chosen the referral hospital or health centre as their first point for treatment rather than private services, self-medication or traditional healers.

At the national level, only 22% of those who are ill generally choose public health services as the first point of treatment, according to the Cambodia Democratic and Health Survey 2005. Clearly, the exit interviews with patients in Phnom Penh and Ang Roka captured many of those who had already chosen public facilities as their first point of service (i.e. theoretically those who would be within the national 22%). Nonetheless, there is reason to believe that the presence of HEF and SKY encouraged the use of public health facilities in Phnom Penh and Ang Roka, which were the first point of service for 53% of all those providing exit interviews in Phnom Penh and 80% in Ang Roka.

The results of the focus group discussions support the judgement that attendance at public facilities is improved by HEF and SKY. In Phnom Penh, if the illness was minor, people still preferred self-medication but for more serious illnesses they preferred to attend a HC or the Phnom Penh MH. If children were sick, there was a preference for the Kantha

Bopha private non-profit hospital, where services are high-quality and completely free. SKY beneficiaries indicated that they preferred the SKY health centre at the Phnom Penh MH first, then private services and only lastly another state hospital.

In Ang Roka, focus group participants indicated that most people go to the pharmacy (self-medication) for first treatment and then to a HC, because generally it is close and costs are low. Many still use private providers if they can afford it, and SKY beneficiaries indicated that if private services were included in the policy they would use them. There was also a strong preference for using the Takeo Provincial Hospital (known as one of the best in the country), which has its own HEF scheme and where services are often free for the poor.

6.4 Contracting of health services

Contracting began in Ang Roka in January 1999 as a Contracting-Out pilot (under which all health services were provided by the contractor) under the MOH/ADB Basic Health Services Pilot Project 1999-2003. The contractor was the Asian Medical Doctors Association (AMDA) until December 2003. In May 2004, Swiss Red Cross (SRC) won the contract for the second phase of Contracting, funded under the national MOH/WB/ADB Health Sector Support Project 2004-2007. Under the new model, the contractor essentially provides overall supervision of MOH staff, financing and management in the contracted OD (the current contract will end in 2008 following a one-year extension). The contract covers management of health services at the RH and at all HCs in the OD, using MOH staff. The Ang Roka RH operates through a Hospital Management Committee and a Cost-Recovery Committee, and the staff must sign performance agreements. In addition to its contractual requirements, SRC pays for exemptions provided to HEF card holders at all HCs (the HEF provider funds exemptions only at the RH).

Contracting is essentially a means for providing additional resources and improving the management of facilities. Contracting is valued by the health administrators and health staff in the OD because it provides for improved staff incentives and helps to improve service quality. The Director of the Ang Roka RH explained that:

> *I appreciate Contracting a lot because before having the Contracting our facilities in Ang Roka started from about zero, since there were only about one or two patients per day or about 10 to 20 patients per month. Contracting helps weaker facilities to operate actively, though a lot of money would have been invested on that purpose. Today, our facilities have been completely transformed… I think that, one day, we could do the same job as the Contractor by ourselves, and I hope that we would be successful.*

According to another key informant in the OD:

> *The advantage of Contracting is that the health staff can receive additional payment, and even if it is not enough it is better than before, so the staff can perform their work better and obey the internal instructions with respect to the [performance] agreements with the facility management…*

As the Contractor in Ang Roka, SRC sees its role in a comprehensive way, not simply as a sub-contractor to the MOH. Its aim is to establish financial and managerial

sustainability in the OD within a few years, creating a situation in which the central MOH then has direct contact with the OD management team (rather than through a contractor). Improvements in key indicators of performance in the OD show that Contracting is effective, though some staff who do not want the discipline imposed by the Contracting system may not support it. Key informants believe that Contracting has improved access for the poor, mainly because the contract with the MOH requires that the poor receive benefits. But additional safeguards, such as HEF, are needed for the poor.

Local health administrators in Ang Roka believed that it would be wrong now to move away from the Contracting model. They believed they would face many challenges if Contracting ended, both because the little support for community participants that is now available and staff incentives would be jeopardised. With incentives, staff could afford not to look for second jobs and other work to support their families, and facilities remained open as required for 24 hours.

Local informants also argued that Contracting had provided a more reliable stream of income to the facilities than reliance on government funding alone, and it had enabled the staff to get on with management and service provision. At the time, 60 staff in the OD were employed by the MOH and another 28 by the Contractor, and these additional jobs would be put in jeopardy by the end of Contracting. Even so, they said a strategy had been implemented in which it was agreed it was time for the health staff "to walk alone" and to administer services in the OD themselves, through an arrangement with the MOH.

A key informant at the Provincial Health Department in Takeo commented:

> *Contracting has benefited our health staff and the service quality in this OD… Contracting can help our health staff to get more salaries than before, so they have been trying to carry out their duties very hard and regularly.*
>
> *Contracting should be continued, it should not be ended. However, I just want to suggest that if Contracting continues, please let our Cambodian health staff implement it, there is no need for foreign staff to do that…*
>
> *With Contracting now, we provide 24-hour services for patients, and the health staff are based in the facilities for 24 hours, but if Contracting is ended, I think [this will not continue].*

6.5 User fees and other revenues

Health services in Cambodia are subsidised by the Government. Through the national health budget, the Government meets the costs of the public health infrastructure, staff salaries and drug supplies to all facilities. User fees are therefore not strictly a 'cost-recovery' mechanism but a 'cost-sharing' mechanism. User fees therefore cover only a minor proportion of the costs of providing health care. Nonetheless, user fees have become an important source of additional revenue to health facilities, including those in Phnom Penh and Ang Roka, to finance running costs and provide additional staff monetary incentives.

The importance of user fees – *in conjunction with funded exemptions* – was emphasized by the Provincial Health Director in Takeo province:

User fees are very important, and in order for user fees to work best, HEF is a must. If we give exemptions to too many patients, the user fee system will fail [because too much revenue would be lost]. Thus, I believe that HEF must complement the user fee system; previously, we recognised that the [financing of the] Provincial Hospital might have collapsed since HEF was not then present.

Main sources of revenue

User fees remain the main source of non-government revenue to referral hospitals in Phnom Penh and Ang Roka, while in both places HEF and SKY also provide a significant source of revenue. However, figures for revenues earned from HEF and SKY appear to understate the HEF/SKY utilisation numbers in each case (c.f. Figures 12 and 14 below).

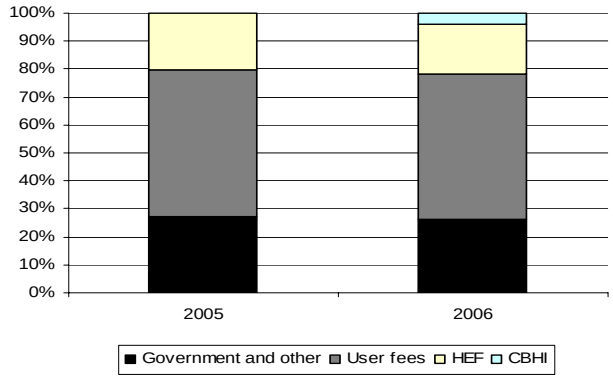
Phnom Penh:

In Phnom Penh, key informants from the Municipal Hospital confirmed the importance of the different sources of revenue:

We earned more money from fee-paying patients than from the HEF and SKY patients. The total revenue from all the patients is 40 million Riel per month, while the revenues of both HEF and CBHI (and some other small NGOs) are 15 million Riel per month… But I anticipate that next year the revenue of HEF and SKY would increase to equal about half of the total revenue.

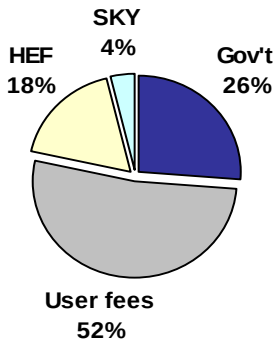
This judgement is supported by revenues earned in 2005 and 2006, as illustrated in Figures 12 and 13, although the anticipated increase in HEF and SKY revenues may not be achieved.

Figure 16. Main sources of hospital revenue: Phnom Penh MH
Per cent of total revenue



Source: HIS data from MOH

Figure 17. Share of RH revenue by category: Phnom Penh MH 2006
Per cent of total revenue



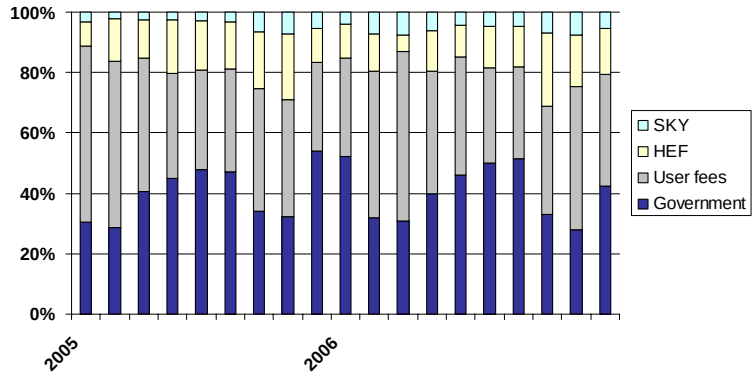
Source: HIS data from MOH

Ang Roka:

The pattern is similar in Ang Roka (Figure 14). SKY managers believe the RH is making a good margin on capitation payments made to the facility (and this may be reviewed in coming years). In both cases, HEF and SKY together provided roughly 20% of total hospital revenues (including government funds) in 2005 and 2006, though the proportion appears to be growing (Figure 15). Some key informants in Ang Roka were of the view that the OD levied the lowest user fees of any district in the province and while this benefited the patients it reduced revenues to the referral hospital and put a limit on staff incentives.

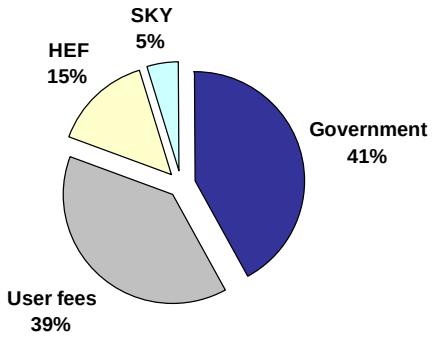
The proportion of hospital revenues coming from HEF and SKY, as illustrated in the following graphs (based on HIS data), are in contrast to the proportions of HEF and SKY patients providing exit interviews (see Figure 1 above). The HIS data most likely provides a more accurate picture of relative utilization by HEF and SKY users than the exit interview returns (which were collected during only one week in 2006). If this is true, HEF already provides a stronger contribution to access, utilization and revenues than the exit interview returns would suggest, despite the short time it has been available in Ang Roka.

Figure 18. Main sources of hospital revenue: Ang Roka RH
Per cent of total revenue



Source: HIS data from MOH

Figure 19. Share of RH revenue by category: Ang Roka RH (April 2005-October 2006)



Source: HIS data from MOH

Patient awareness of fees and exemptions

From the demand side, it is important that patients know about user-fees, are comfortable with the system, know what fee levels to expect and know how to access exemption and reimbursement mechanisms (HEF or SKY) when they are needed. Awareness on these issues acts to reduce financial barriers to access to services, particularly for the poor.

Exit interviews: Returns from the exit interviews suggest that knowledge about user fee schedules at the referral hospitals in Phnom Penh and Ang Roka is limited. At the health centre level, prior knowledge about user fees was much more significant, reaching more than half of all those patients interviewed at facilities, which may reflect the closer proximity of these facilities to the population. Knowledge about the availability of HEF and SKY was much more consistent across referral hospital and health centre patients in both areas, as indicated in Figure 16. Even so, up to a half of the patients interviewed were not aware of HEF or SKY. This may suggest that there is a need for improved IEC, particularly about user-fee arrangements at public facilities.

Figure 20. Patient knowledge of user fees, HEF and SKY

	Phnom Penh		Ang Roka	
	MH	HC	RH	HC
	n = 200	n = 229	n = 100	n = 150
Knew fees in advance	17%	52%	19%	61%
Knew about HEF/SKY	53%	47%	58%	69%

Key informant interview: Key informants from health centres in Phnom Penh supported by HEF through the USG indicated greater attention was given to outreach activities in local communities, providing the opportunity for more extensive information sharing on fees, exemptions, HEF and SKY. Key informants at the Phnom Penh MH insisted that the official fee levels were set low enough to cater for most patients, and well below the level of private services and national hospitals:

> *Our user fee schedule is different from that of the national level institution. The fees charged by our hospital are reasonable and put at a level that the poor could still access services. Fees for a medical check-up are only 3,000-5,000 riel [US$0.75-1.25]; it's not expensive [even though we had to increase them recently]… If now we*

still take only 2,000 Riel for a ward over night [as we did before], our hospital, of course, will go bankrupt…

There has been no [adverse] reaction from the patients or from the NGOs [we cooperate with] since the time we increased the user fee schedule, because the user fees [at other facilities] in the city are high, so though a little bit has been revised to the user fee schedule, it's acceptable, and if compared to the national level hospital, it's half difference.

Key informants in Ang Roka believed that people knew about the fee schedules and were aware of HC services because of the work of the Village Health Support Groups, which were informed about the fees and services. The Contractor (SRC) had arranged community meetings where the health personnel had explained the fee system and the nature of services. User fees were thought not to be a barrier to access, especially at the HC level, where they were very low. Even at the provincial hospital the price of a delivery was only US$30 compared to US$200 in private practices.

Focus group discussions: FGD respondents commonly had the view that the availability of HEF and SKY made people more aware of user-fee schedules and helped to prevent over-payment. They also suggested that, for people with sufficient money to pay them though not necessarily for the poor, the level of the user fees was 'acceptable'. The focus group respondents indicated that there was little social marketing of user fees by the health facilities and that the community was not consulted fully about setting fee levels. At times, it was said, the village chief may tell people about changes. In this regard, illiteracy among villagers was thought to present a problem for good communication. It appeared that HEF and SKY beneficiaries were more aware of fees and fee levels than others.

Staff incentives

Revenue from user fees, HEF and SKY continue to provide a useful additional source of revenue to supplement staff salaries at the Phnom Penh MH (and in Ang Roka too), though the level of staff incentives is still relatively low (particularly where staff numbers are high). According to one informant:

Doctors can receive only from 80,000 riel to 100,000 riel [approximately US$20-50 a month in incentive payments] because there are many doctors, so we divided according to the numbers of doctors; nurses can get only from about 60,000 riel to 70,000 riel per month [US$15-18].

The Ang Roka RH director added:

With HEF, the health care services can be maintained 24 hours a day and the health staffs can get reasonable incentives for their work providing 24-hour services. Thus, the support from outside is really a must. Because of the financing system, we can implement the regulations needed to complete the work.

6.6 Additional patient charges

In addition to official user fees, it appears most patients must spend more money to attend public health facilities. Overall, of the patients providing exit interviews, more than 60%

had paid additional costs. This was especially true for patients attending the Phnom Penh MH, as indicated in Figure 17.

Figure 21. Patients who paid more in addition to user fees

	Phnom Penh		Ang Roka	
	MH	HC	RH	HC
	N = 200	n = 229	n = 100	n = 150
All patients	80%	47%	75%	38%
Of which: paid more for	N = 161	n = 122	n = 75	n = 57
Transport, food and drugs	90%	84%	100%	98%
Payments to staff	9%	7%	0%	2%

Additional costs were incurred mainly for transport and food, and less so for drugs. Additional payments to staff – or under-the-table charges – were much less common. Transport and food costs are generally covered fully by HEF, and SKY covers transport costs for referrals and some other expenditures. The routine drug supply for all MOH facilities is provided through the Central Medical Supply (CMS). However, the need to purchase additional drugs was evident particularly at the Phnom Penh MH (where additional drug supplies are readily available in the city and people have more disposable income). Managers at the Phnom Penh MH explained that patients previously had to buy medicines outside hospital but the situation had changed in recent years when CMS drug supplies improved. Now only 5-10% of patients needed to buy additional drugs. Only if the medicines are inadequate are patients likely to buy medicines outside the hospital. For HEF and CBHI patients, it was claimed that all medicines were provided by the hospital.

Under the table charges

It appears, therefore, that under the table (UTT) charges remain an issue at these health facilities, particularly at the referral hospitals, but not a significant one. It appears also that the problem of UTT is reduced for HEF and SKY patients. HEF schemes commonly police the issue of UTT and enforce penalties on health providers who allow the practice. The HEF provider in Phnom Penh explained that:

> *HEF patients are rarely charged under the table fees; and if it happened, USG would take that amount of money back, but only in the case that we know. If it did happen, I think it would be only a very small amount because the patients want to be treated well and they are poor, so they don't have much money to give to the health staff. Sometimes the poor want to pay extra money because they want satisfactory treatment since the doctors do not care about the NGO's patients. But I think it really does not happen much at all because we have our agents based in the facilities to observe that…*
>
> *However, at the [Municipal] Hospital, where they go to be treated for more serious illnesses, people are really worried about their diseases, and so they feel they have to pay extra money to get effective treatments… Patients have complained about the health staff's attention and treatment, but this is something that we don't have concrete evidence about.*

According to the director of the Phnom Penh MH:

I can assure you 100% that there is no such problem is happening for the HEF, SKY and other NGOs patients. However, it could happen for walk-in patients, but very little. This is because all our staff have understood the management procedure taught by the HEF, SKY and other NGOs. Such a problem might happen with walk-in patients because, for example, a doctor may treat a patient with serum or injection secretly, and we didn't know since we could not control everything. Sometimes, the staff member that accompanies the patient may do something; for instance, the hospital charges only 300,000 riel, but the staff that accompanies the patient charged them 400,000 riel. But the cashier themself can not charge patients more than what is stated in the user fee schedule.

One key informant in Ang Roka said: "I can guarantee that no such a thing is happening right now, but [if there is some payment] it is only for sympathy [i.e. given in good faith by the patient because they appreciate the service provided]". Another informant said that from time to time reports about UTT still occur, but when they are detected staff working under performance agreements are given three warnings and then released from duties. The HEF manager confirmed that procedures were in place to prevent UTT for HEF cases and that it was less likely for HEF patients. Focus group participants confirmed that most people pay the scheduled fee or a fair amount set by the staff and regarded the official fee level as acceptable, though still difficult for the poor. Some thought the fees were too high. Most considered that under the table charges were limited but still occurred and that HEF and SKY helped to control under the table charges. Others thought that UTT may still be a problem at the Phnom Penh MH.

SKY officials confirmed that the contractual arrangements they have with facilities and their monitoring has helped to all but eliminate UTT for SKY beneficiaries, though they were aware of additional payments commonly requested for other patients. In one case, a SKY member at the Phnom Penh MH had been asked by a nurse to pay additional money for an injection for her child; she reported this to SKY and the situation was dealt with.

6.7 Exemptions for the poor

Exemptions for the poor and the near-poor are provided through HEF and SKY, but also to other poor patients by the health facilities themselves. In this study, these un-funded exemptions are called "other exemptions". From the study results, total exemptions provided by the public facilities appear to be at a relatively high level, indicating that the poor are adequately covered.

Exit interviews: Among those patients who provide exit interviews, more than 40% across all facilities had received exemptions of some sort (Figure 18). While among these patients it is clear that HEF and SKY provided a significant proportion of exemptions overall, 'other-exemptions' were still at a relatively high level, and these exemptions are a drain on facility revenues. This may indicate the need to further expand HEF and SKY coverage in these areas. It also appears that in Ang Roka, compared to Phnom Penh, HEF makes a relatively smaller contribution to exemptions overall and SKY a relatively larger contribution, perhaps reflecting the fact the HEF in more long-term in Phnom Penh and SKY is more long-term in Ang Roka (again, these results differ to the financial data illustrated in Figure 15).

Figure 22. Proportion of all exit interviewees receiving fee-exemptions and source of exemption

	Phnom Penh		Ang Roka	
	MH	HC	RH	HC
	n = 200	n = 229	n = 100	n = 150
HEF benefit	25%	24%	18%	14%
SKY benefit	4%	6%	14%	15%
Other exemptions	13%	9%	24%	12%
Total exemptions	42%	39%	56%	41%

Key informant interviews; Key informants at the Phnom Penh MH indicated that 'other exemptions' had been offered in line with MOH policy to the poor, monks, and indigents, and fees had been taken only from those able to pay. Originally (before HEF and SKY were fully operational) about a third of patients received 'other exemptions', but more recently the level was reported to be 3% or 5%, which is well below the level recorded among exit interviewees. It was argued that the exemption system at the Phnom Penh MH was not as strictly applied as in other hospitals, and that the medical staff were free to give exemptions if they thought that was appropriate, without an objective means test. One informant said: "Sometimes, some patients were able to pay for the first stage of their treatments, but later they could not pay, so they were exempted for the later treatment".

Focus group discussions: From focus group discussions, it was clear that the best social marketing of HEF occurred with the pre-identification process, and that for SKY there was a need to extend the marketing process (especially in Phnom Penh). This issue needs further investigation. Focus group participants indicated that few people request exemptions at public health facilities, and if they did, they were often simply referred to the NGO arranging for HEF or SKY. It also appeared that the pre-identification process for HEF in Ang Roka was incomplete; focus group participants indicated that while many people had heard about HEF, many who were not beneficiaries felt that they qualified and would like to be members of the scheme, though they had not seen or heard from the HEF provider. In Phnom Penh, the pre-identification process may have been more effective, reflecting the easier access to poor people in defined squatter settlements.

6.8 Staff behaviour

No data was collected directly to assess the quality of service provided to HEF, SKY and fee-paying patients at the health facilities. However, an attempt was made to determine whether the behaviour and treatment given by the health staff was different for HEF/SKY beneficiaries and fee-paying patients. During exit interviews, all patients were asked if they were satisfied with the treatment they got from the health staff.

No difference in the treatment of patients from any group was detected in the exit interviews, and, overall, a surprisingly high proportion (about 96%) said they were satisfied with their treatment by the health staff. There was also some indication in exit interviews that patients had chosen the public health services because they regarded the level of service as better than what was available at accessible (or affordable) alternatives.

This apparent level of satisfaction with treatment provided by the staff at the public health facilities was confirmed by the focus group discussions. It was also clear that HEF and SKY helped to improve the quality of service, although many thought that health staff

were sometimes difficult and treated patients poorly. In general, the medical treatment received by HEF and SKY patients was regarded as the same as that for fee-paying patients.

According to the Director of the Phnom Penh MH:

> *Talking about the treatment, there is no discrimination at all between different kinds of patients, whether HEF, SKY or others. We provide them with the same treatment. But we have found a few problems. For example, most of the SKY patients are not really pleased with our services because they also need to wait for treatments [along with everyone else]; some SKY patients claimed that they paid the money, so why do they need to wait for treatment and not be the first to be treated? For HEF patients, when they could not find health staff at the services counter, they also complained because they could not get services on time. It's just like that.*

The Ang Roka RH Director confirmed:

> *Yes, all the patients – HEF patients, CBHI patients, and walk-in patients – get the same treatment without any discrimination, that's right, since we can't know in advance that this patient is an HEF or SKY patient, or that patient is a walk-in patient and so on. [We treat them first and then look at the payment.]*

Key informants at the Phnom Penh MH indicated too that HEF had helped to strengthen the referral system, as all patients in the community had first to attend a health centre and only then arrange a referral to the Municipal Hospital. SKY managers believed the quality of care at facilities in Phnom Penh and Ang Roka was acceptable by local standards, though still limited with regard to treatment. An issue was the lack of motivation among staff to get things working well and, in Phnom Penh, an inadequate referral process for complex cases needing national hospital treatment. They believed the quality of care for SKY patients may be better than for walk-in patients, perhaps because of performance agreements signed with the hospital management. Other key informants in Ang Roka argued that facilities were now generally open all day, had staff and drug supplies, and provided friendly service to patients, all of which are the first step in improving quality of care.

6.9 Fairness and stigma

There was little reliable evidence of stigma associated with the identification of the poor for HEF benefits in Phnom Penh or Ang Roka. HEF card holders felt they had a worthwhile benefit, and most people thought that the process was fair, including those who were non-beneficiaries. However, one key informant reported that in Ang Roka some people had withdrawn from HEF at a time when the list of beneficiaries was read out publicly in the village and they did not like to hear their name announced in this way.

The limited gender analysis possible, based on the data available, indicates that women are treated equally through HEF and SKY as they are in services generally, that is in greater numbers than men. This is consistent with the particular need for MCH services in Cambodia.

In particular, the HEF process, which depends on a means-test evaluation through household interviews conducted against objective poverty criteria, was regarded as fair by

most respondents, particularly in focus groups. The Phnom Penh MH Director said he had previously seen patients at the hospital who were poor but did not have HEF or SKY cards, mainly because patients came from all areas and the pro-poor schemes were available only in limited locations. He said that the poor as well as the rich could now access services "because HEF and SKY not only help the poor to access health services in the same way as the rich, but also they help to change the behaviour of the service providers and make them more responsible to the patients".

Previously at the Phnom Penh MH there may have been many people who cheated by using an HEF card for which they were not entitled, but procedures had been improved in collaboration with the HEF provider to prevent this practice. According to the Phnom Penh MH Director:

> *There might have been some HEF people who were really rich; there were some people cheating us, but we didn't want to question them because we are doctors, we have to think about humanity and allow them to be treated through HEF although we knew they were cheating us. I think it's against the principles of HEF, but if there were some rich people coming to be treated in our hospital, we still treated them.*

6.10 Participation and empowerment

There was little evidence to support the idea that the availability of HEF or SKY helped directly to empower patients in their health seeking and treatment behaviours, and few were willing except in extreme circumstances to ask health staff for needed or appropriate treatments even though they may not be satisfied. There was evidence in Phnom Penh, though, that USG (the HEF provider) had provided support to beneficiaries.

The evidence from patients also suggests that, contrary to regulations on the application and changes to user fees outlined in the Health Financing Charter, there was very little consultation with the community on the setting and increase of user charges.

At the Phnom Penh MH fee levels are set by the staff through the hospital finance committee after review by each department and without community consultation. However, the hospital did consult with the HEF and SKY service providers before making changes. The hospital director explained that:

> *Recently, I have talked about fee levels a lot with URC and USG [the HEF service providers]. At the time I established the financing arrangements in 1996-1997, cooperation with them had not yet begun. At that time, we had participation from the Ministry of Health, monks and commune chiefs. Later on, we no longer did that because, if we consider the geographic aspect, there are around 1.3 million people living in Phnom Penh, so we could not invite them all the take part in the meeting. We could not choose only one community person as a representative, and we no longer invited different kinds of people, such as monks, village chiefs and so on, to join the meeting. Rather, we just invited our partners [HEF providers] to get their agreement and to see if they were happy with our revision or not.*

However, in Phnom Penh, directors at the seven HEF-supported health centres said that, with USG support, they had been able to do outreach activities in the community, including discussions about fee schedules.

In Ang Roka, administrators also explained that a community consultation process had taken place (assisted in some circumstances by Village Health Support Groups):

> *We invited the community representative to participate in a meeting with us to discuss the level of fees that were acceptable, although this does not affect the poor since they are helped and supported by HEF… We publicized the fee schedule to the community, and about a year later, at the beginning of 2006, before revising the schedule, we informed the people about what we are going to do.*

It appears that the main impetus for participation and empowerment comes from the activities of the local NGOs, particularly those implementing HEF. In Phnom Penh, USG representatives explained that they had set up the mechanism of User Groups (volunteers from the squatter settlements), which work in the community to identify the poor and provide an avenue for giving feedback to the health system. USG also employed two community liaison officers to deal with HEF issues within the communities. In Ang Roka, where the role of the HEF implementer (Action for Health) is effectively to administer the HEF patient recording and payment procedures at the referral hospital, the social role of HEF is less fully implemented. AFH employs three administrators in Ang Roka but no staff specifically for community liaison, and relies on pre- and post-assessment activities to disseminate information about HEF.

A number of feedback mechanisms had been established by the SKY scheme, including monthly meetings with SKY sales agents in Ang Roka and with partner organisations in Phnom Penh, a complaints procedures for patients, twice-yearly meetings with facilities, and routine patient exit interviews.

6.11 Debts and asset sales

Data collected from the HEF users' database maintained by the USG in Phnom Penh was analysed in Phase 1 of the Access Study. This analysis indicated that the availability of HEF helped to reduce the level of debt and asset sales beneficiaries had incurred to meet health costs and provided them with the opportunity to negotiate reduced interest rates when they were forced to borrow.

However, it appears that the need for debt or asset sales has not been eliminated by the availability of HEF and SKY. Of those patients providing exit interviews, more than 20% overall had borrowed money to pay costs associated with their current visit to the facility, more than a third had borrowed to pay health costs in the last 24 months, and a quarter had sold assets to pay for health costs in the last 24 months (Figure 19). The need to incur debts and sell assets was greatest in Ang Roka, where a higher proportion of people are poor.

Figure 23. Exit interviewees: debts and asset sales for health costs

	Phnom Penh		Ang Roka	
	MH	HC	RH	HC
	n = 200	n = 229	n = 100	n = 150
Borrowed for this visit	14%	13%	54%	19%
Borrowed in the last 24 months	29%	37%	69%	25%
Sold assets in the last 24 months	11%	22%	44%	42%

Consequently, it appears that debts and asset sales for health care remain a problem among these public health facility users in Phnom Penh and Ang Roka. These results were confirmed by the focus group discussions, which indicated that debts for health care are common and widespread and that impoverishment from health costs remains common in these locations. In general, it appears that the use of private providers for health care means an increase in debt levels and asset sales. Among exit interviewees, some patients had borrowed up to 1 million Riel. However, it remains true that borrowing and asset sales seem less common among beneficiaries with HEF and SKY. From the evidence it appears that HEF and SKY may increase the possibility for the discretionary use of money allocated for health expenditures, which is an issue that requires further investigation.

6.12 Contrasts and comparisons

Hospitals cf. health centres

In general, the contrasts between hospitals and health centres related to the types of services provided and the relative costs of care, as was expected. Some of the contrasts observed among those patients providing exit interviews are the following:

- Little use was made of the Phnom Penh MH for patients under-5 years old (perhaps because of the availability of free services at the Kantha Bopha hospital) but the hospital is used more heavily than others for maternal health care.

- The Phnom Penh MH provided comparatively fewer consultations among exit interviewees for gastric and related complaints but relatively more for ear, nose and throat complaints (compared to all other facilities).

- It was more likely that the interviewees knew the fee levels in advance at the health centres, which are more accessible geographically, than at the referral hospitals.

- Not having sufficient money to pay fees was a more likely occurrence for interviewees attending referral hospitals than health centres (prior to the availability of HEF or SKY benefits).

- Exit interviewees were more likely to have paid additional costs on top of user fees at the referral hospitals than at health centres, where costs are relatively lower.

From the evidence, it appears that health centres are acting to some extent as gatekeepers in the referral system, especially with the introduction of HEF and SKY. One question for further investigation is whether in Ang Roka the HEF scheme should be extended formally to health centres in order to reinforce the referral system. And in Phnom Penh an issue is the availability of SKY only at one health centre.

HEF cf. SKY

Between HEF and SKY, the main contrasts reflected the different population segments served by each. Among the main contrasts illustrated by patients providing exit interviews were the following:

- It was more common that HEF patients had not previously attended the facility prior to having HEF than it was for SKY patients not to have previously attended.

- It was more common that the HEF beneficiaries had not previously attended due to a lack of money than it was for the SKY beneficiaries, who previously had mostly used alternate facilities.

- The benefit of having HEF or SKY was commonly regarded as the lower costs for treatment and transport, and after that the likelihood of receiving better service

- For those patients who had not joined the SKY scheme, the most common reason for not doing so was that they did not know of the scheme, and secondly because they already had HEF benefits. HEF patients had commonly not joined SKY because they could not afford the cost.

One key informant in Ang Roka reflected on the cooperation that may occur between the HEF and SKY schemes, particular in conditions where the risk pool was extended across the whole district:

> *From my point of view … I don't want patients to have to pay for care when they are sick, I want to organize a system where people pay in advance, before they are sick, and then when they are sick they can get free treatment. For example, each person needs to pay only $1 per year, and since there are over 100,000 people living in Ang Roka, approximately $100,000 is available each year for paying treatment costs, or in one month about $7,000 or $8,000. And if we think deeply about this, perhaps it could not happen at all because people [who do not understand the concept of insurance] may feel that they were cheated [if they pay a premium but are not sick and do not get any health care] … So, [in a similar way] if HEF buys the insurance cards from SKY [for the poor] I think HEF will also pay more money on that basis.*

Another key informant in Ang Roka considered the possible purchase of SKY premiums for poor patients by the HEF as inappropriate. On the relative sustainability of the schemes, the Director of the Phnom Penh MH expressed a common view that SKY was more sustainable because it was to some extent self-financing:

> *I think both are good, but there is a slight difference in their implementation. HEF is not as stable, because it is stable only when the funds are available [from donors], and if the funds are not available then it would be stopped. The [SKY] health insurance is different from this because it collects money from its members [in the form of premiums] to pay for hospital services. Overall, I think SKY is more stable than HEF.*

Currently, there is little close collaboration between the schemes in Phnom Penh or Ang Roka, though they work side by side. Collaboration with the hospitals and health centres in both places is regarded as good by SKY managers, who also look forward to testing

forms of cooperation between the schemes (with plans for a joint scheme in Kampong Thom province). This is regarded as a complex and difficult question and highly sensitive from the point of view of the HEF arrangements. The relative sustainability of HEF and SKY is an issue that is unresolved and requires further careful examination.

Rural vs. urban

Generally, it is clear that the urban setting is more diverse and more complex than the rural setting, the broad beneficiary catchment area is less well defined geographically and less well contained within an homogenous population. As well, there is far greater competition and a much wider range of choices in service provision in the urban area compared to the rural area, though urban health costs are also relatively higher.

At both sites, Phnom Penh and Ang Roka, the major issues related to poverty and access are common: that is, user fees constitute a barrier for the poor, and HEF as well as SKY provide significant relief. Among the main contrasts were:

- It was more common among the patients who provided exit interviews in Phnom Penh than for those in Ang Roka that they had *not* attended the public facilities prior to having HEF or SKY benefits.
- It was more common among the patients who provided exit interviews in Ang Roka for than those in Phnom Penh that they had chosen the public facility as their first point of service.
- It was more common among the patients who provided exit interviews in Ang Roka for than those in Phnom Penh that they had borrowed money or sold assets to pay for costs associated with health care.
- The Phnom Penh MH was used more frequently among exit interviewees for maternal and child health than was the Ang Roka RH, where few used the facility for MCH care. By contrast, few children under-5 were brought to the Phnom Penh MH.
- It appears that increased access to services and fee relief was more noticeable at the Phnom Penh MH than at other facilities.
- In the rural area, public facilities were more commonly the first point of service among exit interviewees, who generally were more aware of fee levels in advance.

The major observable difference between Phnom Penh and Ang Roka related to the specific conditions under which HEF and SKY had been implemented. A summary of the main differences can be summarised as follows:

Figure 24. Comparison of HEF and SKY between Phnom Penh and Ang Roka

Topic	Phnom Penh	Ang Roka
Health Equity Funding		
Implementation	Began in 1999 and expanded after 2003 to the MH and health centres	Began in April 2005 at the RH only

Facility coverage	The Municipal Hospital and seven health centres adjacent to squatter communities	The formal HEF scheme covers the Referral Hospital only (and health centres are reimbursed by SRC for HEF patients)
Pre-identification	First carried out beginning in 2004 by the HEF implementer in all six targeted squatter communities and mostly completed, with re-identification begun in 2007	First carried out by former HEF agents and only completed in two-thirds of the OD; used by the current HEF implementer; completed through SRC (the Contractor); and a re-identification process begun in December 2006 using local authorities to compile a 'most vulnerable household' list (rather than a household survey)
Community liaison	Local HEF implementer has a history of community work among squatters in Phnom Penh and employs two staff for community liaison activities	Local HEF implementer plays an administrative role only to manage HEF patients at the RH with no formal community activities
SKY health insurance		
Implementation	Began by GRET at one dedicated SKY health centre at the Phnom Penh MH in December 2005	Began by GRET at Ang Roka RH in July 2002, and expanded to all HCs in 2005
Facility coverage	Services available only at the single SKY health centre based at the Phnom Penh MH, with referral to the MH	Services available at all nine health centres in the OD and the Referral Hospital
Conditions and benefits	Premiums sold through 'partner' agencies such as local NGOs working with target populations; arrangements also being negotiated for employer-provided health insurance through SKY. Benefits cover routine HC and RH admission and similar to Ang Roka	Premiums sold to households through SKY agents working from health centres and within communities. Benefits roughly the same as in Phnom Penh

7 Reporting and dissemination of findings

Dissemination of the findings from Phase 1 of the Study was carried out in a number of ways:

- Dissemination Workshop, Ministry of Health, Phnom Penh, 6 March 2006: including invited representatives from the MOH, ADB, DFID, European Union, GTZ, WHO, Belgian Technical Cooperation, CARE, GRET, Health Net International, Health Unlimited, Save the Children Australia, Swiss Red Cross, UNFPA, UNICEF, University Research Company, VSO, Action for Health, Buddhists for Health, CAAFW, CFDS, CHHRA,NYEMO, Pagoda Funds (Kirivong), Stung Treng Provincial Hospital, Svay Rieng Equity Fund Steering Committee, Urban Sector Group, MoPoTsyo Patient Information Centre, and CAS.
- AusAID seminar on the Study of Financial Access to Health Services for the poor, Canberra, 22 June 2006, attended by interested staff from relevant AusAID sections.

- National Forum on Health Equity Funds, officially sponsored by MOH, WHO and BTC, Phnom Penh, February 1-3, 2006. The forum was attended officials from the BTC Head Office, Belgium, and the WHO Western Pacific Region Office, by officials from the national, provincial and district levels of the MOH, the Ministry of Economy and Finance, and other key ministries, and representatives from key international and local non-government organizations including HNI, SRC, URC, BTC, UNICEF GTZ. Four presentations on Phase 1 of the Access Study were made at one Forum session dedicated to the Impact of HEF on access to health services by the key researchers: Peter Annear, David Wilkinson, Maurits van Pelt and Men Rithy Chean
- Regional Seminar on District Health Systems, Vientiane, Lao PDR, October 25-27 2006, sponsored by the MOH Lao PDR and BTC. The Seminar was attended by representatives of BTC Head Office, Belgium, the WHO Lao Representative and other WHO regional staff, the University of Queensland, the MOH Lao PDR, the MOH Thailand, the MOH Vietnam, the MOH Cambodia, BIARSP Philippines, SRC, SCA, GTZ, URC, and the Institute for Tropical Medicine (Antwerp). Peter Annear made a presentation to the Seminar of the Access Study in Cambodia.
- The Phase 1 Access Study Report has been published and is currently available on both the AusAID and the WHO websites: (www.ausaid.gov.au/research/researchreport.cfm?Type=PubRB&FromSection=Research); (www.who.int/health_financing/countries/experiences/en/index1.html).
- An article based on the study titled "A challenge for Australia's health aid strategy: Access to health services for the poor" co-authored by Peter Annear and Jim Tulloch was published in issue 72 of the Development Bulletin (ANU Canberra), 2007.

Dissemination of the findings from Phase 2 of the Access Study has begun and will continue with further conference presentations and publications. Already completed are:

- Preliminary results from Phase 2 of the Access Study were presented at the AusAID seminar on Financing Health Insurance in the Asia-Pacific Region (with Prof. Jim Butler), Canberra, 27 June 2007, attended by interested staff from relevant AusAID sections.
- Preliminary findings were presented to local stakeholders in Phnom Penh and Ang Roka on 13-14 August 2007. The workshops were attended by representatives from all key local MOH departments and local NGO providers and took the form of an initial presentation followed by a focus group discussion led by researchers from CAS. The purpose of the workshops was to correct, validate and deepen the results of the Phase 2 study.

Other planned dissemination, publication and reporting activities for the Access Study or using major materials from it include:

- National Access Study Dissemination Workshop, Ministry of Health, Phnom Penh, December 2007: including invited representatives from the MOH, major donors, HEF/CBHI/Contracting providers and participating health NGOs.

- An article by the Chief Investigator and the WHO Health Financing Advisor on experiences with health financing and poverty reduction expected to appear in a special issue on health financing of the Institute of Tropical Medicine, Antwerp, Belgium, series “Studies in Health Service Organisation and Policy”.
- A paper (sponsored by the World Bank) on recent achievements in health financing in Cambodia to be presented by the Chief Investigator and the Director of DPHI (MOH Cambodia) at the Prince Mahidol Award Conference in Bangkok Thailand in January 2008 to representatives from leading international financial, donor and health related organizations, with preliminary presentation and discussion to conference planners in Bellagio, Italy, in November 2007.
- A situational review of health financing and universal health insurance coverage in Cambodia commissioned from the Chief Investigator by UNESCAP (Economic and Social Commission for the Pacific and Asia) for presentation at national and regional conferences in Cambodia and Bangkok in December 2007 and January 2008.
- A commissioned chapter by the Chief Investigator on health financing and poverty in developing countries drawing on the experiences in Cambodia for publication in a report on public and social policy in Papua New Guinea to be published by the Globalism Institute, RMIT University, in 2008.

8 Conclusions

Almost universally in Phnom Penh and in Ang Roka the main benefit derived from the availability of the HEF and SKY schemes was regarded as the reduced costs of treatment and improved access to services. This was evident from all sources of data.

Research questions

As a result of the Phase 2 research, our view of demand-side and pro-poor financing schemes such as HEF and SKY – working within the context of supply side mechanisms such as user fees and procedures like Contracting – is richer and more complex. With regard to the research questions originally proposed for this study we can conclude with a degree of confidence that, where the procedures of Contracting, HEF and/or CBHI are implemented:

- User-fee systems are applied appropriately, the regulated fee schedule is generally implemented properly, fees are generally regarded as appropriate, and under-the-table charges are limited.
- User fees none-the-less act to exclude the poor from health services and, due to cost, many poor people do not attend health facilities when needed.
- HEF and CBHI schemes together with other facility-based exemption systems provide increased access to services and act to cover most of the poor, many of whom did not previously attend facilities due to cost.
- There is a common perception among patients that treatment procedures are generally the same for HEF and CBHI patients as for those who pay fees, and patients are generally satisfied with the treatment they receive from the health staff, though some problems still occur in this regard.

- The implementation of these schemes in the urban and the rural setting had much in common. The major differences arose from the greater diversity and complexity of the urban catchment population and in the different management arrangements in each place.

Phase 2 findings

In general, the main findings from exit interviews, focus group discussions and key informant interviews were consistent, and indicated that the demand-side financing schemes – HEF and CBHI – worked to improve access to health services. The findings suggest that:

- HEF is the only way to provide access to health services to people who previously did not have it because they could not afford to meet the costs. From the point of view of financial access for the poor, HEF is the only effective mechanism.

- CBHI brings more people into the public health system by providing pre-paid health services at a lower total cost than the alternatives previously used (private services or user fees at public hospitals) but does not provide access for the poor.

- There is, in practice, little overlap between HEF and CBHI beneficiary populations, though there may be movement between the schemes over time where the two socio-economic categories (the very poor and the less poor) meet – on the one hand, poor people may choose *not* to purchase CBHI premiums because they already have HEF benefits; on the other hand, such people generally could *not afford* to pay CBHI premiums if HEF were not available.

Access Study results

With regard to the demand-side financing mechanisms, the main conclusions from the findings of the Phase 1 and Phase 2 of the Access Study taken as a whole are that HEF and CBHI together can provide coverage for a significant proportion of the population and protect the poor and the near-poor from health costs and catastrophic health expenditures.

HEF and CBHI help to increase the use of public facilities by those who could not previously afford to attend or by those who previously used other alternatives.

HEF and CBHI increase the scope for discretionary use of out-of-pocket payments for health care and help to reduce the burden of borrowing and asset sales to meet health expenditures. HEF and CBHI help to reduce the problem of under-the-table charges.

The demand-side financing schemes, along with user-fee and Contracting procedures, have acted to improve the behaviour of the health staff towards patients and to make services more responsive to the needs of the poor, but do not yet fully empower patients.

In general, HEF is regarded as fair with no feelings of stigma felt by HEF beneficiaries. Within the community, people see the real benefit of having HEF and value the

entitlement. HEF has to some extent empowered poor patients by increasing their range of choices in seeking health care.

The concept of insurance is widely understood by SKY members but requires considerable education to be understood by the general community. For CBHI, the principal problem is to identify potential users who have the financial resources needed to meet regular premium payments. In the case of HEF, the main problem arises in the methods used for the complete and consistent pre-identification of the poor as beneficiaries.

The approach taken to the implementation and management of HEF and CBHI is an important issue, and extending the consistent coverage of both schemes is needed. HEF works best to provide access for the poor where the activities of the fund providers and administrators extend deep into the community. To this end, extending formal HEF coverage to health centres (and not just referral hospitals) is an advantage, and providing community liaison services through the HEF scheme helps to increase its effectiveness.

One significant view was that the provision of Government services could benefit greatly from increased cooperation with the HEF and CBHI schemes, currently provided by non-government organisations. One informant (a public health provider) said:

> *I would like to stress that if the Government would cooperate [more closely] with HEF it would be really very good, because, firstly, the poor could get better access to health care services, and, secondly, the service providers would be less able to take under the table charges, since this would break the contract between the NGO and the MOH… There has been effective collaboration between HEF and SKY. [In the public health services] we have to broaden our mind and not be so narrow.*

There is a universal feeling that the two demand-side financing schemes are complementary. The data collected from service users and health providers indicates that they generally regard CBHI schemes as more sustainable than HEF. However, the coverage of CBHI schemes is commonly low and the risk pool often too small to guarantee financial viability (particularly in the early stages).

HEF, CBHI and Contracting all appear to help achieve more accountability on the side of the service providers and best achieve this when the are implemented together.

Financing schemes

The four different financing schemes included in the Access Study – user fees and Contracting on the supply side; HEF and CBHI on the demand side – each make a contribution to improving the delivery of health services and to increasing the utilization of public health services. These schemes perform different tasks and work best in combination to assist in the development of a stronger and more effective pubic health service.

The public health system in Cambodia is a subsidized system that is used increasingly to meet the needs of those who cannot afford private health care. However, private health

expenditure (including out-of-pocket spending at pubic and private facilities) remains the largest part of health expenditure nationally.

User fees: Within the Cambodian public health system, user fees are in effect a *revenue-supplementation* and not a *cost-recovery* mechanism – user fees provide significant additional revenue to health facilities on top of government funding for infrastructure, salaries and drug supplies. This additional funding to health facilities has been used effectively to improve staff incentives, meet running costs and help keep health facilities functioning on a 24-hour basis. These are important measures that work to improve the quality of health service delivery, which is nonetheless still limited from a medical point of view.

Contracting: Contracting has worked successfully in a limited number of locations (a total of 11 health operational districts nationally, including in Ang Roka) to provide additional operating resources, to strengthen the management of health services, and to improve health service delivery. The staff performance agreements attached to the Contracting model and the supervision provided by an external agent have helped to improve staff performance and attitudes. A well functioning facility provides both an incentive to staff and a better opportunity for people in the community to seek health care.

HEF: Health equity funding provides a universal, funded fee-exemption system to protect the poor from health-care costs and to provide increased access to public health services. The limitation of alternate (un-funded) exemption systems is the drain they cause on user-fee revenues earned by health facilities. HEF overcomes these financial limitations and provides a social mechanism for meeting the needs of the poor. It is now established that the imposition of user fees (including within the Contracting model) is most effective when it is combined with HEF.

CBHI: Community-based health insurance also provides a useful stream of revenue to health facilities, and works to protect the not-so-poor from catastrophic health expenditures. CBHI encourages the use of public health facilities contracted to provide health services and assists in improving the quality of services delivered. For many people, CBHI acts to replace the use of alternate, private and often more expensive health services with the use of public facilities. Together, CBHI and HEF can potentially provide free or pre-paid health coverage to a catchment area comprising the majority of the population.

Limitations of the data

Different methods of data collection were triangulated to ensure the validity of the findings. However, operational research like this in a context where schemes and administrative systems are new has its own limitations.

The first limitation was the absence of complete, consistent and reliable routine quantitative data on health facility utilization and revenues. Data from the official HIS system, collected from the health facilities, provided the most consistent record but was

limited by the lack of data for earlier years and lacked information against some indicators. No consistent HIS data was available on revenues and exemptions at the facility level, and no data was kept on HEF or SKY attendances and revenues at health facilities. The routine quantitative data available from Contracting, HEF and SKY implementers was patchy and inconsistent, and difficult to compare. This limitation may be overcome in future as the newly developed HEF Monitoring system developed by the MOH (which began collecting routine data against common indicators from HEF implementers in 2007) comes fully into operation.

There are limitations too in conducting qualitative research in an environment like that confronting the research, particularly in rural areas, where literacy rates are low, respect for authority is evident, and familiarity with qualitative techniques is limited. In such circumstances, using personnel from the MOH to collect data and using scheme managers to arrange respondent meetings can distort the results. Every effort was made, however, to maintain objectivity, to provide a friendly and relaxed environment for respondents, and to meet respondents in their usual settings. As far as practicable, all data collection activities were supervised by the lead investigators.

Conducting qualitative research in a second language is also a constraint. All interviews with Khmer speaking respondents (exit interviews, focus groups and key informants) were conducted in the Khmer language by Khmer-speaking interviewers from the MOH and CAS. This was done to ensure the respondents felt comfortable and were able to express themselves openly and without hesitation. However, to analyse the data, it was necessary to translate all responses into English. This was done by people familiar with the research data and working as a part of the research team from the MOH, from CAS and as research assistants, and was completed under the supervision of the Chief Investigator. Even so, with a large volume of this material, it was not possible to check every translation.

Major issues arising

Finally, the major issues arising from this study and requiring further investigation can be summarised as follows:

- Social health protection methods need to be tailored carefully to different conditions and different circumstances in a way that supports and compliments national health planning and health financing strategies. Such schemes need to be supported by government even where provided by non-government agencies and need to be brought within a single national strategy.

- In Cambodia, HEF coverage is already extensive and is growing, and in those areas where it has the longest period of implementation it covers most of those who are considered as poor. The sustainability of HEF depends in the short term on the continued support of donor funds and NGO agencies; in the longer term, HEF sustainability depends on increased government support and its incorporation into national demand-side financing strategies.

- The main issue facing CBHI schemes is to expand the risk pool of beneficiaries to such an extent that the different schemes become financially sustainable.

Currently, all such schemes require financial subsidies, at least for administration if not always to meet benefit payments.

- There is a strong argument for building closer relationships between HEF and CBHI schemes. Because they serve not identical but connected segments of the population, and poverty is fluid, HEF and CBHI could clearly achieve economies by sharing administrative arrangements, including a common database of beneficiaries and common benefit payment procedures. Whether HEF should subsidise CBHI schemes by purchasing premiums on behalf of the poor is an open question that requires further careful investigation.

- Social protection schemes like HEF and CBHI, along with supply-side procedures including user fees and Contracting, need to be brought together under a single National Health Financing Strategy that paves the way for the introduction at an appropriate time of universal health insurance coverage.

This Phase 2 study confirmed the findings of the Phase 1 research, principally that HEF provides increased access to health services for the poor, that SKY serves a section of the population who are less poor and are able to afford the payment of insurance premiums, and that Contracting improves the management of health facilities and encourages increased utilization, including by the poor. These three health financing schemes – each one still in the pilot phase and still to be up-scaled for national coverage – together with official user fees, play an important part in the delivery of health services within the Cambodian health system.

The Phase 2 research confirms that the optimum situation is where these schemes work in combination to address different but related problems and to meet the needs of different sections of the population. There is reason, therefore, to continue all schemes, to expand the scope and up-scale the implementation of each to meet national needs, to work towards increased cooperation between the schemes where they co-exist, and to look forward to a situation in which all financing schemes, on both the supply and the demand sides, are unified in a single national strategy.