# The Coverage of Cervical Cancer Screening in Khon Kaen, Northeast Thailand

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#### Abstract

Cervical cancer is a common cancer in Thai women and one of the only cancers that can be readily cured if early detection is successful. The Pap smear is an accepted as an appropriate means for cervical cancer screening at present. However, there are still some management problems with early detection programmes. Since data showing how many women have been screened by Pap smear are limited in Thailand, the present study was conducted with the aim of determining coverage in a defined population in the sample area, Thakaserm sub- district in Nampong district, Khon Kaen province, Thailand. The investigation was carried out during June-August 2000 to collect information on history of screening for cervical cancer using questionnaires. All women aged 20 and above were asked to answer the set of questionnaires a total of 1,199 women responded. There were 66.9% that reported having received a Pap smear in their life. It is important to find a strategy to increase the coverage of cervical cancer screening programme for this population.

Key Words: Cervical cancer screening - Khon Kaen, Thailand - early detection programmes

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#### Introduction

Cervical cancer is a common cancer in Thai women and continues to be the leading cancer among women with age adjusted incidence rates of 18.0 and 25.5 per 100,000 women during 1992 to 1994 in Khon Kaen and Chiang Mai respectively (Deerasamee et al.,1999). Cervical cancer is an important public health problem worldwide. It is the second most common cancer among women, with an estimated 468,000 new cases and 233,000 deaths in the year 2000. Almost 80% of the cases occur in developing countries, where, in many regions, it is the most common cancer of women. The highest incidence rates are observed in Latin America and the Caribbean, Sub-Saharan Africa, and South and South East Asia (Parkin et al., 2001).

In Thailand, as in other countries, the Pap smear is accepted as an appropriated means for cervical cancer screening at present. The propose of screening or early detection efforts is to find pre-invasive cancer, localized and hence more often curable and in the cervix precancerous lesion can be readily found before they have developed into invasive cancers. Hence it is very important for women to be screened for cervical cancer. That means the coverage should be as high as possible. However, the cervical cancer screening programme in Thailand has not been established officially at the provincial level. It is mostly opportunistic or in formal setting programmes so that younger women with a relatively low risk in antenatal or postpartum clinics are mainly included. However, so far there is only limited information on the coverage of Pap smear screening in Thailand. Therefore the present study was conducted to assess the level of coverage and principal barriers to cooperation in screening programmes in a defined population in a sample area, Thakaserm sub-district, in Nampong district of Khon Kaen Province, in the northeast of Thailand.

#### **Material and Methods**

The study was carried out during June to August 2000 using questionnaires to collect information on age, Pap smear

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Table 1. Age Distribution of the Total Population inThakaserm sub-district, Khon Kaen Province in 2000

Age Group	Male		Fen	Female	
	No	%	No	%	
< 5	383	3.5	413	3.8	
5-9	396	3.7	376	3.5	
10-14	396	3.7	350	3.2	
15-19	411	3.8	431	3.9	
20-24	464	4.3	456	4.2	
25-29	563	5.2	605	5.6	
30-34	565	5.2	529	4.8	
35-39	392	3.6	393	3.6	
40-44	394	3.6	405	3.7	
45-49	319	2.9	317	2.9	
50-54	322	2.9	320	2.9	
55-59	216	2.0	219	2.1	
60-64	174	1.6	196	1.8	
65-69	146	1.4	133	1.3	
70 +	261	2.4	312	2.9	
Total	5,402	49.8	5,455	50.24	

history and compliance with screening programmes in the target group. All women aged 20 and above with total number of 3,885 in Thakaserm sub-district, Khon Kaen province, were invited to participate in the study voluntarily and answer questions under interview by trained interviewers. With literate women, they were asked to answer and fill questionnaires by themselves. Number and percentage data for each variable of interest are presented.

### Results

The total population of Thakaserm sub-district was 10,875, with 5,402 males (49.8%) and 5,455 females (50.2%). There are three health personnel taking responsibility for primary heath care with 110 community health volunteers in this population (Table 1). The target population was defined as women in the sub-district aged 20 years old and above, which was 3,885 out of 5,455 (71.0%). All of these 3,885 female were invited to answer the questionnaires voluntarily, which were distributed by local health personnel. There were 1,199 women participating in the study with the age distribution shown in

Table 2. Age Distribution of Women Participating(Answered the Questionnaire) in the Study

Age group	No. of cases	%
20 - 29	185	15.4
30 - 39	345	28.8
40 - 49	315	26.3
50 - 59	207	17.3
60 +	147	12.3
Total	1,199	100.0

# Table 3. Pap Smear History of Women who Participatedin the Study

Ever received Pap smear test	Number	%
Yes	802	66.9
No	397	33.1
Total	1,199	100.0

Table 4. Age Distribution of Women Reporting a Historyof Pap Smears

Age Group	Number of subjects ever receiving a Pap smear test	%	Number of subjects never receiving a Pap smear test	%
20-29	118	14.7	456	16.9
30-39	273	34.0	529	18.1
40-49	233	29.1	405	20.7
50-59	129	16.1	320	19.6
60 +	49	6.1	312	24.7
Total	802	100	397	100.0

Table 5. Reasons of Those Who were Never Screenedfor Cervical Cancer by Pap Smear Test

Reasons	Number	%
Shyness	165	41.6
No knowledge about screening	69	17.4
Fear	46	11.6
No concern	46	11.6
No money	36	9.1
Fear to know if positive result	16	4.0
Other	11	2.8
Total	389	100.0

Table 2. There were 66.9% of who women reported that they had a Pap smear test at least once, 33.1% never receiving a Pap smear test in their life (Table 3 and Table 4). For those who never received Pap smear the reasons given were shyness, lack of knowledge about screening (never know that has to screen) and fear, as shown in Table 5.

## Discussion

This study was conducted to establish a base for development of health care services. One problem in implementing any project programme in the community is the lack of basic information and a database. We found that the database from the local administration office in fact did not correspond with the real situation of the people living in the villages. At Thakaserm local health office the responsible individuals tried to establish a family folder for the entire population in the sub-district. However, this is still at beginning and not completely workable. From our first survey of coverage of the women aged 20 and above, the coverage was 66.9% and the women who never had the Pap smear accounted for 33.1% of the . The coverage is much less than other countries such as Italy, where women with at least one test in the last three years were 98.6% (Ronco et al., 1998). The coverage was reported to be 82.3% in Belgium tested at least once (Abyn and Van Oyen, 2000). The three main reasons for those who never have Pap smear test in this study were shyness about being examined by Health personnel, lack of awareness of cancer and no money. These barriers should be considered by introducing modern screening technologies. Government should encourage and support development or enhancement of an appropriate management system. As known from many countries such as in Nordic countries, North America and Europe, the incidence of malignant cervical cancer is generally low. These low rates date from the introduction of a very successful broad-coverage, cervical screening ("Pap smear") (Hakama et al., 1986, Parkin et al., 1985).

In Thailand a well organized system can be established in any primary health care unit by completing family files including women at high risk with the age of 35 and above. All such women should have a Pap smear at least once to give nearly 100% coverage in each community. This will be the ultimate goal to reduce the incidence of cervical cancer in Thailand in the future.

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