



# Prevalence and Incidence of Depression in the Thai Elderly

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## Abstract

The purposes of this study were to study the prevalence and incidence of depression in elderly Thais. A field survey study was implemented. The sample consisted of 1,713 elderly people in 35 communities from 4 districts surrounding Siriraj Hospital Bangkok Noi, Bangkok Yai, Taling Chun and Bang Plud. These areas are the peripheral part of Bangkok and most of them have extended family. The Thai Geriatric Depression Scale (TGDS) and the Thai Mini Mental State Examination (TMSE) were used as screening tests, for data collection.

The prevalence of depression was 12.78 per cent, of which 8.23 per cent had only depressive symptomatology (male 5.43%, female 9.63%) while 4.55 per cent had both depression and cognitive impairment (male 2.8%, female 5.54%). The point incidence (one year) of depression was 7.27 (male 1.58%, female 5.68%).

The major contributing factors in depression were financial, poor family relationships and physical illness. The prevention and management of these factors may bring about a better quality of life for the elderly in Thailand.

**Key word :** Prevalence, Incidence, Depression, Thai Elderly

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Depression is one of the most frequent of all medical illnesses among the elderly<sup>(1)</sup>. It is a pernicious illness associated with episodes of long duration, high rates of chronicity, relapse, and recurrence, psychosocial and physical impairment, and

mortality and morbidity<sup>(2)</sup>. Epidemiological studies show evidence that depressive disorders, including episodic major depression and dysthymia, are frequent conditions, with a lifetime prevalence of up to 15 per cent for men and 24 per cent for women<sup>(3-5)</sup>.

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In Thailand, previous studies have found different results in the incidence of depression from 82.28 per cent in all age groups of Bangkok people to 35.1 per cent in the elderly group<sup>(6,7)</sup>. These publications show that depression in the Thai population is very common. Despite the fact that depression is treatable, it has been extensively documented that patients with depression are being seriously undertreated the vast majority of patients with chronic major depression are misdiagnosed, receive inappropriate or inadequate treatment, or are given no treatment at all<sup>(8)</sup>.

This study was a prospective study in Thailand to find out the prevalence and incidence of depression in the elderly group.

## MATERIAL AND METHOD

A field survey study was implemented. The sample consisted of 1,713 elderly people (age 60 and above) in 35 communities from 4 districts surrounding Siriraj Hospital Bangkok Noi, Bangkok Yai, Taling Chan and Bang Plud. These areas are the peripheral part of Bangkok and most of them have

**Table 1. Average age of the elderly subjects divided by sex.**

Sex	N	Age	
		Mean	SD
Male	571	68.17	7.02
Female	1,142	67.82	6.58
Total	1,713	68.04	6.94

extended families. The Thai Geriatric Depression Scale (TGDS), and the Thai Mini Mental State Examination (TMSE) were screening tests for depression and cognitive impairment respectively. Descriptive statistics were computed by using SPSS for windows.

## RESULTS

The study included a total of 1,713 elderly; 571 males and 1,142 females. The mean age was 68.17 years for males and 67.82 years for females. (Table 1)

Results of the study were as follows :-

### 1. Prevalence and incidence of depression and cognitive impairment. (Table 2)

- Prevalence - depression only 8.23 per cent.
- depression with cognitive decline 4.55 per cent.
- depression, total 12.78 per cent.
- cognitive impairment without depression 5.49 per cent.

2. Point incidence of depression in the elderly within one-year follow-up was 7.27 per cent. (101 cases from the total 1,390 cases, Table 3)

3. The result of this study reflects the importance of the financial problem, interpersonal relationships in the family, and physical problems are the major precipitating causes of Dysthymia and Adjustment Disorder with depressed mood. (Table 4 and 5)

**Table 2. Prevalence rate of depression in the Thai elderly.**

Subjects	Prevalence of depression				Prevalence of cognitive impairment (without depression)				Prevalence of depression + cognitive impairment			
	Male		Female		Male		Female		Male		Female	
	N	%	N	%	N	%	N	%	N	%	N	%
Male (571)	31	5.43	110	9.63	15	4.38	79	6.92	16	2.80	62	5.43
Female (1,142)			Total				Total				Total	
Total (1,713)												
	N	%			N	%			N	%	N	%
	141	8.23			94	5.49			78	4.55		

- Prevalence of depression =  $8.23 + 4.55 = 12.78$
- Prevalence of cognitive impairment (without depression) = 5.49
- Prevalence of depression + cognitive impairment = 4.55

**Table 3. Incidence (one year) of depression in 1,390 Thai elderly.**

Sex	N	%
Male	22	5.68
Female	79	1.58
Total (1,390)	101	7.27

**Table 4. Psychiatric diagnoses in the cases detected.**

Diagnoses	N	%
Major Disorder	31	30.69
Dysthymia	23	22.77
Organic Mood Syndrome	4	3.96
Adjustment disorder with depressed mood	43	42.58
Total	101	100

**Table 5. Percentages of problems associated with dysthymia and adjustment disorder with depressed mood in incident cases.**

Problem	N	%
Physical health problem of the elderly (eg. hypertension, osteoarthritis, diabetes mellitus, cataract, cardiac problems)	18	17.82
Physical health problem of the family member	12	11.88
Relationship problems with family members	27	26.74
Financial problem	33	32.67
Loss of close person	11	10.89
Total	101	100

## DISCUSSION

The prevalence of depression in the elderly found in this study was 12.78 per cent. This finding was somewhat lower than that of earlier studies, which were 82.8 per cent, 35.1 per cent and 24.1 per cent respectively(6,7) (Table 2). The explanation of the difference should be seen, as Lepin and Ban Chez(9) stated, as resulting from several different reasons, for example : the allocation of subjects, variety of instruments (self-reported scale vs interviewer's rating scale), diagnostic criteria (Diagnostic and Statistical Manual for Mental Disorders DSM vs test scores), etc.

In this study, screening for depression in the elderly was done using the Thai Geriatric Depression Scale (TGDS). Psychiatric interviews and mental state examinations were performed by psychiatrists for diagnostic confirmation. It was found that the prevalence percentages were close to the results of studies from the United States, which were approximately 15 per cent(10,11). The incidence of depression in a one year study was 7.27 per cent (1.58% in males and 5.68% in females) (Table 3). It was higher than in a Canadian study, which found only

2 per cent(12) ; This could be explained by the fact that the elderly with a previous history of depression were excluded from the Canadian study, while the present study did not have an exclusion criterion like this one.

Psychiatric diagnoses in the cases detected were adjustment disorder with depressed mood, major depression, dysthymia, and organic mood syndrome, and were 42.58 per cent, 30.69 per cent, 22.77 per cent, and 3.96 per cent respectively. (Table 4)

The results showed that the basic problems in the cases of Dysthymia and Adjustment disorder with depressed mood were quite similar. The major problems were financial, difficult family relationships and physical illnesses (Table 5). In addition, the present study was done in communities of lower to middle socioeconomic status, unfortunately in the period following an economic crisis in the country. Therefore, further study in this area might bring a better understanding of the problem and help to find ways to develop a better quality of life for the elderly in the future.

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## ความชุกและอุบัติการณ์ของภาวะซึมเศร้าในผู้สูงอายุไทย

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วัตถุประสงค์ของโครงการวิจัยเพื่อศึกษาความชุกและอุบัติการณ์ของภาวะซึมเศร้าในผู้สูงอายุไทย โดยมีรูปแบบการศึกษาเป็นวิจัยเชิงสำรวจ กลุ่มตัวอย่างประกอบด้วยผู้สูงอายุจำนวน 1,713 คน ใน 35 ชุมชน จาก 4 เขตกรอบบริเวณโรงพยาบาลศิริราช คือ เขตบางกอกน้อย บางกอกใหญ่ คลองชาน และบางพลัด ซึ่งชุมชนทั้งหมดเป็นชุมชนรอบนอกกรุงเทพฯ มีลักษณะเป็นครอบครัวขยาย เครื่องมือที่ใช้ในการเก็บรวบรวมข้อมูลได้แก่ แบบประเมินภาวะซึมเศร้า แบบประเมินการทำงานของสมอง

ผลการศึกษาพบความชุกของภาวะซึมเศร้าในผู้สูงอายุไทยร้อยละ 12.78 จำแนกเป็นภาวะซึมเศร้าอย่างเดียวร้อยละ 8.23 (ชายร้อยละ 5.34 หญิงร้อยละ 9.63) และภาวะซึมเศร้าร่วมกับภาวะทางสมองร้อยละ 4.55 (ชายร้อยละ 2.8 หญิงร้อยละ 5.54) อุบัติการณ์การเกิดภาวะซึมเศร้า (point incidence) ร้อยละ 7.27 (ชายร้อยละ 1.88 หญิงร้อยละ 5.68) ปัญหาที่พบในกลุ่มผู้สูงอายุที่มีภาวะซึมเศร้าได้แก่ ปัญหาการเงิน ปัญหาล้มพัฒนาภาพที่ไม่เด็กภายในครอบครัว และปัญหาสุขภาพทางกาย การป้องกันและการจัดการแก้ไขปัญหาที่เกี่ยวข้องดังกล่าว น่าจะเป็นแนวทางที่จะทำให้เพิ่มคุณภาพชีวิตของกลุ่มผู้สูงอายุไทย

คำสำคัญ : ความชุก, อุบัติการณ์, ภาวะซึมเศร้า, ผู้สูงอายุไทย

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