

LOSING YEARS OF LIFE IN PATIENTS WITH CHRONIC OBSTRUCTIVE PULMONARY DISEASE IN AKTOBE REGION IN 2014

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Abstract

Background: To analyze the disease burden of chronic obstructive pulmonary disease (COPD) among people in the Aktobe region.

Purpose: This study explores the first of facts losing years of life (Years of Life Lost) to chronic obstructive pulmonary disease (COPD) in the Aktobe region.

Methods: The lost years of life are made up of two components, such as mortality rates and life expectancy. According to the international methodology we performed a calculation years of life lost index by the following formula.

Results: During the studied deaths by 2014 COPD causes 156 is in the city, in rural regions 328. The high mortality rate of the city population is observed in the age of 65-69 with indicator 37 and in the second place the ages are 60-64 (29) and 70-74 (29). Here we also found that the burden of COPD is higher in age 65-69 where YLL 880.1 and age 60-64 with indicator of YLL is 820.3. Although in rural indicator the mortality rate in the age group 70-74 (72) are lower than in the age group of 65-69 (68) and the age group 70-74 (60), we found that the above YLL in the age group 65-69 years (1617.5), and in age group 70-74 (1164.7), than in age of 75-79 years (1098.9).

Conclusions: We found that despite the low death rate among the rural population aged 70-74 years, which amounts to 60 people with comparator of more high death indicator in age of groups 75-79 and 65-69, second high years of life lost indexed in age group 65-69 with 1617.5. Our research is testified that this age group require attention to priority for provide timely, affordable medical care.

Keywords: COPD, DALY, Years of Life Lost.

Introduction: One of the most common non-communicable diseases in the Republic of Kazakhstan is a chronic obstructive pulmonary disease (COPD). According to the World Health Organization in 2012, COPD was the 6th place in the disease burden in the world with the performance 92,377 (DALYs (000s)), 1306 DALYs per 100,000 population, while the figure in the Republic of Kazakhstan amounted to 195 DALYs. The study of the DALY include the indicator years of life lost and years lost due to disability.

In 2014 mortality from COPD in the Aktobe region was 484 people.

In order to conduct a full analysis of the dynamics of the prevalence of COPD requires study of its burden.

Thus, in this thesis, we present the years of life lost due to COPD in the Aktobe region for 2014 year.

Methods: The lost years of life are made up of two components, such as mortality rates and life expectancy. According to the international methodology we performed a calculation years of life lost index by the following formula:

YLL = death x life expectancy

YLL = years of life lost

Death = mortality rate

Life expectancy = Life expectancy

Results: During the studied deaths by 2014 COPD causes 156 is in the city, in rural regions 328. The high mortality rate of the city population is observed in the age of 65-69 with indicator 37 and in the second place the ages are 60-64 (29) and 70-74 (29). Here we also found that the burden of COPD is higher in age 65-69 where YLL 880.1 and age 60-64 with indicator of YLL is 820.3. Although in rural indicator the mortality rate in the age group 70-74 (72) are lower than in the age group of 65-69 (68) and the age group 70-74 (60), we found that the above YLL in the age group 65-69 years (1617.5), and in age group 70-74 (1164.7), than in age of 75-79 years (1098.9).

Table 1. Indicators of mortality and years of life lost in 2014

Age	City		Rural	
	deaths-2014	YLL-2014	deaths -2014	YLL-2014
0		0,0	0	0,0
1-4		0,0	0	0,0
5-9		0,0	0	0,0
10-14		0,0	0	0,0
15-19		0,0	0	0,0
20-24		0,0	0	0,0
25-29		0,0	0	0,0
30-34		0,0	0	0,0
35-39		0,0	0	0,0
40-44		0,0	0	0,0
45-49		0,0	0	0,0
50-54	1	37,6	8	300,6
55-59		0,0	18	592,1
60-64	29	820,3	38	1074,9
65-69	37	880,1	68	1617,5
70-74	29	562,9	60	1164,7
75-79	25	381,6	72	1098,9
80-84	30	343,5	34	389,3
85+	5	41,0	30	246,0
Итого	156		328	

Conclusions: We found that despite the low death rate among the rural population aged 70-74 years, which amounts to 60 people with comparator of more high death indicator in age of groups 75-79 and 65-69, second high years of life lost indexed in age group 65-69 with 1617.5. Our research is testified that this age group require attention to priority for provide timely, affordable medical care.

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