

Prevalence of Alcohol Abuse and Alcoholism in General Population of Mostar Region, Bosnia and Herzegovina

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ABSTRACT

The aim of this study was to determine the prevalence of alcohol abuse and alcoholism in the general population of Mostar region, Bosnia and Herzegovina. This study was conducted on a stratified sample of 704 participants. The prevalence of alcohol abuse was determined using standardized questionnaire on alcohol consumption – Michigan Alcoholism Screening Test. Prevalence of alcohol abuse with high risk for alcoholism was 9.9% and prevalence of alcohol addiction was 2.1%. In student population, there were 3.9% of alcohol addicts and 11.1% of persons with high risk of alcoholism. In high school population, there were 1.7% of alcohol addicts and 14.4% of persons with high risk of alcoholism. In Mostar region there was a high prevalence of alcoholism and problematic drinking, especially in high school and student population. There is a need for extensive preventive measures that have to include education, early diagnosis and intervention.

Key words: alcoholism, youth, prevalence, Mostar, Bosnia and Herzegovina

Introduction

Alcohol addiction and alcohol abuse are among the most prevalent mental disorders in general population¹. Male gender and alcoholism in family have been found to be the most important risk factors for the development of alcohol addiction – sons of alcohol addicts become addicts themselves in 25% of cases². Risk for development of alcohol addiction in men in the general population is very high, between 3% and 5%, while in women it amounts to 1%². Alcohol abuse and alcohol addiction are highly influenced by genetic factors². Five to ten percent of population of the USA and Europe are alcohol addicts³.

In Europe and in the USA, around 50% of adults consume alcohol more or less regularly or sometimes, 5–10% are alcohol addicts, and 20% consume alcohol excessively⁴. Also, 60% of homicides and suicides are performed under the influence of alcohol and excessive consumption of alcohol lowers the expected life age approximately for 10 years⁴. As a study performed in the USA has

shown, the development of alcoholism in 71% of participants is influenced by stress.

In Bosnia and Herzegovina, alcohol abuse and addiction have become a considerable problem, especially after the war, with massive abuse of alcohol drinks and other psychoactive substances in the working population and youth.

The aim of this study was to determine the prevalence of alcohol abuse and alcoholism in the general population of Mostar region, Bosnia and Herzegovina.

Subjects and Methods

This study was performed on a stratified sample of 704 randomly selected participants (543 or 77% of men and 161 or 22.9% of women). The sample consisted of 180 final grade pupils of primary school, 180 high school pu-

pils, 180 students from 6 university faculties, and 164 metal industry workers from the Mostar region, Bosnia and Herzegovina. Participants were divided into groups: 14–20 years (358 or 52.6%), 21–30 years (188 or 26.2%), 31–40 years (30 or 4.1%), 41–50 years (75 or 10.6%), 51–60 years (37 or 5%), and more than 60 years (13 or 1.5%). The survey was performed in 2002.

To determine the risk of alcoholism, we used Michigan Alcoholism Screening Test (MAST)⁵, a quantitative, structured instrument composed of 24 questions. This test examines the consequences of problematic alcohol drinking in alcohol addicts, persons accused of driving under the influence of alcohol, and persons with other problems related to excessive alcohol consumption. The scoring was performed on the basis of MAST scale according to the following criteria: 0–3 points – low risk of alcoholism; 4–9 points – high risk of alcoholism; more than 10 points – alcoholism. The survey was anonymous and the participation was voluntary.

Results

In the total sample of 704 participants, there were 87.9% of participants with low risk of alcoholism, 9.9% of participants with high risk of alcoholism, and 2.1% of alcohol addicts (Table 1).

In student population, there were 3.9% of alcohol addicts and 11.1% of participants with high risk of alcoholism. In high school pupils, there were 1.7% of alcohol addicts and 14.4% of participants with high risk of alcoholism.

In the population of the employed persons, there were 82.3% participants with low risk of alcoholism, 14.6% of participants with high risk of alcoholism, and 3.1% of alcohol addicts.

Discussion

In the total sample of 704 participants, there were 87.9% of participants who had low risk for alcoholism, 9.9% who had high risk of alcoholism, and 2.1% who were alcohol addicts. Among employed participants, 82.3% had low risk of alcoholism, 14.6% had high risk of alcoholism, and 3.1% were alcohol addicts. Our findings were somewhat lower than in Croatia, where between 3.5% and 4% of general population were addicted to alcohol⁶.

We found especially high prevalence among high school pupils and students, although in primary school pupils 100% of participants had low risk of alcohol abuse. Several other studies have also found high alcohol consumption in youth – a study from Brazil has also shown a consumption of alcohol among youth. Similarly, a study on student population in Ethiopia showed the prevalence of 9.2% of participants with severe alcohol consumption in 1989 and 31.3% in 1988⁷. In Lesotho, 50% of 1133 of examines aged between 11 and 22 years consumed alcohol in some part of their life⁷. Data from the USA from 1994 showed that 56% of primary school pupils and 80% of students consumed alcohol drinks. From that number, 15% of primary school pupils and 34% of students engaged in severe alcohol consumption⁸. Another study in the USA did a survey among pupils in high school or less, postsecondary education without a four-year college degree, and students after completed college. This study emphasized the need to intervene early to prevent at-risk alcohol use¹⁰.

Studies of the use of alcohol treatment services have covered a very wide age range, rather than focusing specifically on young adults, so team of experts from Duke University Medical Center, Columbia University, and New York State Psychiatric Institute performed a survey among college students (18–22 years). Results showed that college-aged adults had a high prevalence of alcohol use disorders, yet they were very unlikely to receive alcohol treatment or early intervention services or to show a need for such services¹¹.

The society of Bosnia and Herzegovina could be considered a posttraumatic society since it still suffers the consequences of a recent war in the country, which caused huge material damage and left a large number of refugees and killed or severely wounded people. One of the important characteristics of posttraumatic societies is increase in the use of psychoactive substances, including alcohol^{9,12–14}, which was confirmed by our study.

Conclusion

Prevalence of alcohol abuse with high risk of alcoholism in general population of Mostar region, Bosnia and Herzegovina, in postwar period was 9.9%. This prevalence was higher in student population (11.1%) and even higher in high school pupils (14.1%). Prevalence of alco-

TABLE 1
DISTRIBUTION OF PARTICIPANTS ACCORDING TO MICHIGAN ALCOHOLISM SCREENING TEST

| | Employed | | Primary school pupils | | High school pupils | | Students | | Total (\bar{X}) | |
|------------|----------|------|-----------------------|-----|--------------------|------|----------|------|---------------------|------|
| | N | % | N | % | N | % | N | % | N | % |
| Low risk | 135 | 82.3 | 180 | 100 | 151 | 83.9 | 153 | 85.0 | 619 | 87.9 |
| High risk | 24 | 14.6 | 0 | 0 | 26 | 14.4 | 20 | 11.1 | 70 | 9.9 |
| Alcoholism | 5 | 3.1 | 0 | 0 | 3 | 1.7 | 7 | 3.9 | 15 | 2.1 |
| Total | 164 | 100 | 180 | 100 | 180 | 100 | 180 | 100 | 704 | 100 |

holism in general population was 2.1%, 3.9% among students, and 1.7% among high school pupils. High prevalence of alcohol addicts and persons with high risk of alcoholism in student population and high school pupils is especially alarming since it indicates a possible in-

crease in alcoholism in future generations. All this shows that there is a need for extensive preventive measures including education, early diagnosis, and intervention.

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PREVALENCIJA ZLOUPORABE ALKOHOLA I ALKOHOLIZMA U OPĆOJ POPULACIJI MOSTARSKOM PODRUČJA, BOSNA I HERCEGOVINA

SAŽETAK

Cilj ovog rada bio je istražiti prevalenciju zloupotrebe alkohola i alkoholizma u općoj populaciji područja Mostara, Bosna i Hercegovina. Istraživanje se zasnivalo na stratificiranom uzorku od 704 ispitanika. Prevalencija zloupotrebe alkohola je ispitana korištenjem normiranom upitnika – Michigan Alcoholism Screening Test. Prevalencija zloupotrebe alkohola s visokim rizikom alkoholizma iznosila je 9,9%, dok je prevalencija ovisnosti bila 2,1%. Među studentima zabilježeno je 3,9% ovisnika i 11,1% osoba koje su bile pod visokim rizikom za razvoj alkoholizma. U srednjoškolskoj populaciji bilo je 1,7% ovisnika i 14,4% osoba s visokim rizikom za razvoj alkoholizma. Ovim istraživanjem zabilježena je visoka prevalencija alkoholizma u Mostarskom području, posebice među studentima i srednjoškolskim učenicima. Rezultati ukazuju na potrebu opsežnih preventivnih aktivnosti s ciljem obrazovanja, rane dijagnoze i intervencije.