

Alcohol Consumption Trends in Various Social Strata

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ABSTRACT

Background: Alcoholism is a type of addictive illness, causing both physical and psychological dependence. It is a major social, economical and health problem.

Aim: To find out the relationship between age and socioeconomic status.

Methods: The study population included 60 individuals of different age group with different socioeconomic state. They participated in cross-sectional surveys on drinking habits in a period of 2010 to 2015 with age range of 18-50 years. Victims included in the study were taken from the emergency department of Sir Ganga Ram Hospital Lahore.

Results: Among these 60 victims, all were males. 70% of victims were between the ages of 18 and 35 years, while 30% victims were between the ages of 36-50 year. It was observed that 47.6% victims belonged to SE (socioeconomic) class A, 33.3% belonged to SE class B and 55.5% belonged to SE class C with age group 18-25 year. On the other hand 14.2% victims belonged to SE class A, 66.6% belonged to SE class B and 33.3% belonged to SE class C with age group 26-35 year. Among age group 36-50 years, 38.1% victims belonged to SE class A, 38.1% belonged to SE class B and 11.1% belonged to SE class C. The clinical signs noted included alcoholic smell from the mouth in 100%; slurred speech in 83.3%; congested eyes in 98.3% and 80% had gait changes.

Conclusion: It is therefore concluded that unlike other studies we found that middle class with age group 26-35 years are heavy drinkers as compared to other age groups and socioeconomic classes. The reason of this excess consumption of alcohol is most likely due to anxiety and distress due to family matters.

Keywords: Alcoholism, age, socioeconomic status.

INTRODUCTION

Alcohol is considered as a disease of addictive illness based on alcohol abuse and alcohol dependence¹. Alcohol misuse is a major source of harm and an emerging cause of concern. There are approximately 79,000 deaths due to excessive alcohol use each year in the United States and it may be the 3rd leading lifestyle-related cause of death². In local city of Lahore, the prevalence rate of alcohol use is 32-45% in age 16-35 year and it decreases with age³.

The sensations that alcohol has on the nervous system are varied and depend mainly on age and amount it is taken in but it is more common in young people. Its use during adolescence may affect the structural and functional maturation of the brain as well as cognitive and behavioral dysfunctions. It is known that neurobiological and neurochemical processes underlying the adolescent-specific vulnerability to drug addiction reach a plateau at the age of 18-24 years^{4,5}.

The effects of chronic alcohol abuse can cause both medical and psychiatric problems. General indications of the effect of alcohol on the central nervous system depend on the dose and may include euphoria (emotional instability), intoxication (confusion) and drunkenness (lack of self criticism, double vision, severe slowing of reflexes, lack of coordination, mental confusion, permanent loss of consciousness etc)⁶.

Factors increasing the risks associated with alcohol use include the different age groups' reduced sensitivity to alcohol sedation and increased sensitivity to alcohol-related disruptions in memory⁷. Other factors are positive family history of alcoholism and emerging comorbid psychiatric conditions. Additionally, factors that can lead to excessive drinking include stress, anxiety, depression and social factors⁸.

Excess of alcohol alters metabolism, affects blood pressure, affects the heart rhythm and can cause severe forms of intoxication. Liver cirrhosis, heart disease are the main consequences of a prolonged and excessive use of alcoholic beverages⁹. Additional societal costs associated with problem drinking include child abuse, domestic violence, crime and lost productivity¹⁰.

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At the individual level, the most widely used signs are education (an assess of human capital), income (an assess of material resources), and social class (a status-based ranking of occupation within society)¹¹. Socioeconomic position is a complex social construct that is measured in epidemiological studies by different individuals¹². Genetic and environmental influences on drinking amount vary with SES¹³. There is also evidence that different socioeconomic domains may have distinct associations with varying alcohol use¹⁴.

Previous studies indicate towards association of age with socioeconomic status (SES) and alcohol use. According to them, both adolescents and adults belonging to low and high SES are more likely to engage in alcohol use.

This study is designed to examine this association, that is, which socioeconomic class of adolescent, adult or older is more likely to engage in alcohol use and related consequences.

MATERIALS AND METHODS

The study involves 60 adult persons of different age and various socioeconomic classes presented at emergency department of Sir Ganga Ram Hospital during period 2010 to 2015 with age range 18-50 years. They were arrested by police for causing nuisance at public places and were brought by it for medico legal examination. The examination also included the age group and socioeconomic status of examinees. Clinical findings were recorded which

included smell, slurring of speech, vision and gait confirming alcoholism. Drinking patterns were measured by total consumption, frequency of subjective intoxication and types of drinking.

RESULTS

A total of 60 subjects were examined during a period of 2010 to 2015. Among these 60 cases, all were males. Majority of cases i.e. 42(70%) were between the ages of 18 and 35 years, while 18(30%) cases were between the ages of 36-50 year (Table 1). It was observed that 47.6% victims belong to SE (socioeconomic) class A, 33.3% belong to SE class B and 55.5% belong to SE class C with age group 18-25 year. On the other hand 14.2% victims belong to SE class A, 66.6% belong to SE class B and 33.3% belong to SE class C with age group 26-35 year. Among age group 36-50 years, 38.1% victims belong to SE class A, 38.1% belong to SE class B and 11.1% belong to SE class C (Table 2). The clinical signs noted included alcoholic smell from the mouth in 100%; slurred speech in 83.3%; congested eyes in 98.3% and 80% have gait changes (Table 3).

Table 1: Frequency distribution of subjects with reference to age

Age group	Frequency	%age
18-25	21	35
26-35	21	35
36-50	18	30

Table 2: Age and socioeconomic class of subjects

Age group	Class A		Class B		Class C	
	Frequency	%age	Frequency	%age	Frequency	%age
18-25	10	47.6	07	33.3	10	55.5
26-35	03	14.2	14	66.6	06	33.3
36-50	08	38.1	08	38.1	02	11.1

Table 3: Positive clinical signs of subjects

Clinical Signs	Frequency	%age
Smell	60	100
Speech slurred	50	83.3
Eyes congested	59	98.3
Gait changes	48	80

DISCUSSION

According to our study 35% of victims have age range of 18-25 years. Among this age group most were the students (data not shown). However studies reported that peak frequency of binge drinking in males occurred at age of 24-26 years as compared to age 18-20 in the individuals^{15,16}. Our study is in line with a study which found that young males were more likely to report alcohol-related absenteeism

compared to older workers and females¹⁷. It is found that drinking more than the recommended per-occasion is likely to impair mental processes of cognitive, emotional, and social maturation and physical performance^{18,19}. Consequences of college drinking include missed classes and lower grades, injuries, sexual assaults, overdoses, memory blackouts and may result in death.

According to our study 35% of victims have age range of 26-35 years. However a study reported that the prevalence rate in age 26-35 years was 21%²⁰. According to a study some people are alcoholic due to pleasure-seeking tendencies, and some are alcoholic to remove anxiety. These people may be able to go without drinking for long periods of time but are unable to control themselves once they start²¹.

On the other hand in the victims with age 36-50 years the drinking pattern is different. Recently it is reported that elderly appear to be more susceptible to alcohol's physiological and behavioral effects compared to adults²². Police records reported that most of the offences are usually due to drinking, and this may increase the seriousness of condition. Study found that in half of the cases there is family violence²³.

Present study observed that in age group 18-25 years approximately 50% of the victims belong to higher and lower class. According to a study the consequences of similar drinking patterns in higher and lower class are more severe for those with lower socioeconomic status may be due to unhealthy life style^{24,25}. A study reported that the higher percentage of younger group involved in binge drinking is because of their involvement in the evil for pleasure or company's sake in the beginning and later on became addict to it²⁷.

According to our study in age group 26-35 years approximately 66% of the victims belong to middle class as compared to victims belonging to higher and lower socioeconomic class. Our study is in contrast to studies which observed that among men from ages 21-39, the proportion of abstainers and infrequent drinkers were belonging to higher social class due to psychological distress with no depression treatment⁷. Another study stated that different dimensions of drinking (quantity and frequency) had different associations with socio-economic status. Study stated that the reason of drinking in middle socioeconomic class is their status consciousness which they fail to maintain so this class may have clinical depression²⁸.

Among age group 36-50 years, approximately 38.1% victims belong to SE class A and B as compared to victims belong to class C (11.1%). Recently it is reported that excess consumption was the highest in age range 35-45 years with high SE class. In this age group alcohol use contributes to disorders like domestic violence and marital conflicts²⁰.

The clinical signs noted included alcoholic smell from the mouth in 100%; slurred speech in 83.3%; congested eyes in 98.3% and 80% have gait changes. Clinically, the smell of alcoholic beverage in the breath is a definite sign of alcohol intake, further evidence is provided by the combination of other signs e.g., excitement, changes in eyes, dryness of tongue or excessive salivation, slurred speech, confusion, disturbed co-ordination, tremors of hand, staggering gait and sluggish reflexes³.

Several important limitations of this study should be mentioned. First, the number of participants is small, especially when data is examined separately

by gender. The models need to be interpreted with caution due to the small number of participants.

CONCLUSION

It is therefore concluded that unlike other studies we found that middle class with age group 26-35 years are heavy drinkers as compared to other age groups and socioeconomic classes. The reason of this excessive consumption of alcohol is most likely anxiety and distress related with family matters.

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