**INTRODUCTION**

Tobacco use is the leading cause of preventable death globally, contributing to more than 5 million estimated deaths every year and if current smoking patterns continue; it will cause some 10 million deaths each year by 2020. i.e. about 650 million people will eventually be killed by tobacco.(WHO 2006)

According to WHO estimates, about 194 million men and 45 million women use tobacco in smoke or smokeless form in India. Out of this, 65% of all men use some form of tobacco (about 35% smoking, 22% smokeless tobacco, 8% both).(WHO 1997)

In India smoking and tobacco dipping are major health problems and one of the largest preventable causes of disease and premature death. As per WHO (1997), about a third of the male global population smokes and it is estimated that the global prevalence of smoking will be 22.7% by 2020 and 22% by 2023. (Mendez 2012)

Before the 1950s till the lethal health consequences of smoking became widespread tobacco consumption had its proponents. In the 16th century, Native Americans believed tobacco to have beneficial cognitive properties: “The smoke, they say, gives them intelligence and enables them to see clearly through the most intricate matters.”

Since then the use of tobacco was propagated till the World War II. With the introduction of advanced methods for analysing large-scale epidemiological data, scientists could demonstrate conclusively that smokers were at higher risk for many deadly diseases, particularly lung
cancer. In the U.S. Surgeon General’s report on Smoking and Health, (1964) it was concluded that an indictment of cigarette smoking that linked it to lung cancer, chronic bronchitis, laryngeal cancer, and probably heart disease and urged “appropriate remedial action.”

In the same report it is also reported that nicotine is not directly implicated in the dire health effects of smoking, but it is the most pharmacologically active ingredient in tobacco smoke and the primary agent responsible for addiction to smoking with nicotine.

Tobacco smoking has also been associated with negative effect on several types of cognitive functions.

The study of reaction time spans more than a century and provides an index of processing capability of the central nervous system and also a simple means of determining sensory motor performance. (Geraldine, 1981)

Reaction time depends on several factors. As a result, there can be no single universal reaction time.

The delayed or fast reaction time indicates deteriorated or improved processing of central nervous system and or sensory motor performance. (Nikam and Gadkari, 2012)

The degree of alertness is often judged by the speed with which one responds to the situation. In research studies reaction time measures have been commonly used to assess the alertness of an individual.
One of the most prominent patho-physiological changes is probably atherosclerosis of arteries and arterioles supplying blood to the cerebral hemispheres which may be due to long term tobacco usage.

The Indian government has recently proposed a ban on smoking in public places. This rule has definitely brought down the number of smokers in India.

The reality is that banding smoking in public has actually led to an increase in another form of tobacco consumption: Dipping tobacco. Since the introduction of nicotine is directly in blood amount of nicotine absorbed is much higher in dipping. The effect of tobacco is much higher, if dipping habit increase.

Therefore in the present study, it was planned to estimate auditory reaction time, visual reaction time, blood pressure and pulse rate in control, smokers and dipping tobacco users under different age groups.